UNITED STATES AIR FORCE

# OCCUPATIONAL SURVEY REPORT



## AIRCRAFT ELECTRICAL AND ENVIRONMENTAL SYSTEMS

## AFSC 2A6X6

## AFPT 90-2A6-095

## SEPTEMBER 1997



OCCUPATIONAL MEASUREMENT SQUADRON
AIR FORCE OCCUPATIONAL MEASUREMENT SQUADRON
AIR EDUCATION AND TRAINING COMMAND
1550 5TH STREET EAST
RANDOLPH AFB, TEXAS 78150-4449

**DISTRIBUTION FOR AFSC 2A6X6 OSR**

| | OSR | ANL EXT | TNG EXT | JOB INV |
|---|---|---|---|---|
| AFOMS/OMDQ | 1 | | | |
| AFOMS/OMYXL | 10 | | 5 | 10 |
| AL/HRMM | 2 | | | |
| AL/HRTE | 1 | | 1 | |
| ARMY OCCUPATIONAL SURVEY BRANCH | 1 | | | |
| CCAF/AYX | 1 | | | |
| DEFENSE TECHNICAL INFORMATION CENTER | 2 | | | |
| HQ ACC/DPTTF | 3 | | 3 | |
| HQ AETC/DPPEE | 3 | | 3 | |
| HQ AFMC/DPUE | 3 | | 3 | |
| HQ AFPC/DPAAD5 | 1 | | | |
| HQ AFPC/DPPAPC | 1 | | | |
| HQ AFSOC/DPPMT | 2 | | 2 | |
| HQ AMC/DPPET | 1 | | | |
| HQ PACAF/DPAET | 3 | | 3 | |
| HQ USAF/ILMM | 1 | | 1 | |
| HQ USAFE/DPATTJ | 3 | | 3 | |
| HQ USMC/STANDARDS BRANCH | 1 | | | |
| NAVMAC | 1 | | | |
| USAFAMS/DTMP | 1 | | 1 | 1 |
| 364 TRS/TTMAS (511 9TH AVENUE, STE 1, SHEPPARD AFB TX 76311-2338) | 2 | 1 | 2 | 2 |
| 782 TRG/TTS (826 G AVENUE, STE 4, SHEPPARD AFB TX 76311-2857, ATTENTION: MR. DAVE PHILLIPS) | 1 | | 1 | |

## TABLE OF CONTENTS

THIS PAGE INTENTIONALLY LEFT BLANK

**TABLE OF CONTENTS**
(Tables, Figures, Appendices)

**TABLE OF CONTENTS (CONTINUED)**
(Tables, Figures, Appendices)

**TABLE OF CONTENTS (CONTINUED)**
(Tables, Figures, Appendices)

**THIS PAGE INTENTIONALLY LEFT BLANK**

## PREFACE

This report presents the results of a detailed Air Force Occupational Survey of the Aircraft Electrical and Environmental Systems career ladder, Air Force Specialty Code (AFSC) 2A6X6. Authority for conducting occupational surveys is contained in AFI 36-2623. Copies of this report and pertinent computer printouts are distributed to the Air Force Functional Manager, the operations training location, all major using commands, and other interested operations and training officials.

The survey instrument was developed by Lieutenant(N) Brian R. Thompson, Inventory Development Specialist, with computer programming support furnished by Mr. Tyrone Hill. Mr. Richard G. Ramos provided administrative support. Second Lieutenant Charlie L. Law, Occupational Analyst, analyzed the data and wrote the final report. This report has been reviewed and approved by Lieutenant Colonel Roger W. Barnes, Chief, Airman Analysis Section, Occupational Analysis Flight, Air Force Occupational Measurement Squadron (AFOMS).

Additional copies of this report can be obtained by writing to AFOMS/OMYXI, 1550 5th Street East, Randolph AFB Texas 78150-4449, or by calling DSN 487-5543. For information on the Air Force occupational survey process or other on-going projects, visit our web site at http://www.omsq.af.mil.

GEORGE KAILIWAI III, Lt Col, USAF
Commander
Air Force Occupational Measurement Squadron

JOSEPH S. TARTELL
Chief, Occupational Analysis Flight
Air Force Occupational Measurement Squadron

THIS PAGE INTENTIONALLY LEFT BLANK

## SUMMARY OF RESULTS

1. **Survey Coverage**: The Aircraft Electrical and Environmental Systems career ladder was surveyed to obtain current job and task data for use in examining training programs. Survey results are based on responses from 1,823 AFSC 2A6X6 personnel, which represents 30 percent of the assigned population. The Air National Guard (ANG), Air Force Reserve (AFRES) and all major commands are satisfactorily represented in the survey sample.

2. **Specialty Jobs**: Four clusters and four jobs were identified in the career ladder structure analysis. The four clusters were: Flightline, Backshop, Training, and Supervisors. Four independent jobs were also identified: Power, Oxygen, Quality Assurance Inspector, and Safety Inspector. Specialty descriptions in AFMAN 36-2108 are complete and generally are accurate portrayals of the nature of the job.

3. **Career Ladder Progression**: Nearly all 3-skill level personnel perform only technical duties. Although 5-skill level jobs are technically oriented, they also have a minimal supervisory aspect. The 7-skill level members devote most of their time to supervisory/management duties. The AFMAN 36-2108 *Specialty Description* provides a broad and accurate overview of tasks and duties performed within the career ladder, as well as the primary responsibilities of members in the eight jobs identified by the job structure analysis process.

4. **Training Analysis**: A match of survey data to the AFSC 2A6X6 Specialty Training Standard (STS) identified numerous tasks not referenced to the STS. This included all of the tasks listed under the Performing General Aircraft and Cross Utilization Training (CUT) Activities. Career ladder functional managers and training personnel should carefully review the unsupported STS items to justify their continued inclusion in the training documents.

5. **Job Satisfaction Analysis**: The majority of job satisfaction measures for the AFSC 2A6X6 were high. Group incumbents are about as satisfied as the previous samples and very similar to other career ladders in a comparative sample. As might be expected, those jobs and clusters with more experienced personnel tended to have the highest expressed levels of job satisfaction.

6. **Implications**: The career ladder structure is quite similar to that found in the previous OSR. Career ladder progression is normal, showing a movement away from the technical tasks common at the lower skill levels as the incumbents move toward the 7-skill level. For this survey, the ANG and the AFRES AFSC 2A6X6 personnel were included in the survey process and the analysis of the career field.

THIS PAGE INTENTIONALLY LEFT BLANK

# OCCUPATIONAL SURVEY REPORT (OSR)
# SERVICES CAREER LADDER
# (AFSC 2A6X6)

## INTRODUCTION

This is a report of an occupational survey of the Aircraft Electrical and Environmental Systems career ladder, completed by the Occupational Analysis Flight, Air Force Occupational Measurement Squadron. This survey was completed as part of a 5-year cycle. The current Specialty Training Standard (STS) is dated September 1994. The last occupational survey for this career ladder was published in January 1993.

### Background

As described in the AFMAN 36-2108 *Specialty Description*, dated 30 April 1994, members of the Aircraft Electrical and Environmental Systems career ladder inspect, troubleshoot, and maintain aircraft electrical and environmental systems, subsystems, components, and test equipment. In addition, members also install, test, modify, repair and overhaul aircraft electrical and environmental systems, components and test equipment.

All members are required to attend the J3ABR2A636-001 Aircraft Electrical and Environmental Systems apprentice course. The course, offered at Sheppard AFB, is 87 days long. The Aircraft Electrical and Environmental Systems Craftsman course, J3AAR2A676-000, is 10 days long. Entry into the career ladder currently requires Armed Forces Vocational Aptitude Battery minimum scores of 45 Mechanical and 60 Electronic, and the strength factor of "K" (weight lift of 70 lbs) must be met or exceeded.

## SURVEY METHODOLOGY

### Inventory Development

The data collection instrument for this occupational survey was USAF Job Inventory (JI) Air Force Personnel Test 90-2A6-095, dated August 1996. A tentative task list was prepared after reviewing pertinent career ladder publications and directives, tasks from the

previous survey instrument, and data from the last OSR. The preliminary task list was refined and validated through personal interviews with 41 Subject-Matter Experts (SMEs) (selected to cover a variety of major commands (MAJCOMs)) at the following locations:

| BASE | REASON FOR VISIT |
|---|---|
| Sheppard AFB TX | 364 TRS/TTMAS |
| Hurlburt Field FL | 16 SOW/LGM |
| Dyess AFB TX | 7 LG/LGMCV |
| Phoenix AZ | 161 ARG |
| Nellis AFB NV | 57 LG/OG |
| Barksdale AFB LA | 2 LG/OG |
| Travis AFB CA | LGLT |

Others contacted included Air Force Personnel Center (AFPC) classification personnel, functional and resource managers, and the Air Force Career Field Manager.

The resulting JI contained a comprehensive listing of 654 tasks grouped under 25 duty headings, and a background section requesting such information as grade, duty title, functional area, types of equipment operated, job satisfaction, and forms used.

## Survey Administration

In October 1996 there were 3,920 active duty members assigned to the career ladder. Additionally, there were 1,050 Air Force Reserve (AFRES) personnel, and 1,233 Air National Guard (ANG) personnel assigned to the career ladder. Fifty percent of the eligible population were selected by a stratified random selection process for participation in the survey. Base Training Offices at operational bases worldwide administered the inventory to 2,831 eligible AFSC 2A6X6 members. Members eligible for this survey consisted of the total assigned 3-, 5-, and 7-skill levels, excluding the following: (1) hospitalized personnel; (2) personnel in transition for a permanent change of station; (3) personnel retiring during the time the JIs were administered to the field; and (4) personnel in their job less than 6 weeks. Job incumbents were selected from a computer-generated mailing list obtained from personnel data tapes maintained by AFPC, Randolph AFB TX.

Respondents were asked to complete an identification and biographical information section first and go through the booklet and check each task performed in their current job. After checking all tasks performed, respondents then rated each of these tasks on a 9-point scale showing relative time spent on that task, as compared to all other tasks checked. The ratings ranged from 1 (very small amount time spent) through 5 (about average time spent) to 9 (very large amount time spent).

To determine relative time spent for each task checked by a respondent, all of the incumbent's ratings are assumed to account for 100 percent of their time spent on the job and are summed. Each task rating is then divided by the total task ratings and multiplied by 100 to provide a relative percentage of time for each task. This procedure provides a basis for comparing tasks in terms of both percent members performing and average percent time spent.

## Survey Sample

The final AFSC 2A6X6 survey sample includes responses from 1,823 job incumbents. Table 1 reflects the MAJCOM distribution of assigned AFSC 2A6X6 personnel. The 1,823 respondents represent 30 percent of the assigned population and 64 percent of those surveyed. Table 2 reflects the distribution by paygrade and component status. These figures show that the sample is representative of the total population.

## Task Factor Administration

Job descriptions alone do not provide sufficient data for making decisions about career ladder documents or training programs. Task factor information is needed for a complete analysis of the career ladder. While most participants in the survey process completed a USAF JI, selected senior AFSC 2A6X6 personnel were also asked to complete booklets providing judgments on task training emphasis (TE) or task difficulty (TD). The information gained from task factor data is used in various analyses and is a valuable part of the training decision process.

**Training Emphasis (TE)**. TE is a rating of the amount of emphasis that should be placed on tasks in entry-level training. The 47 senior NCOs from the career ladder who completed a TE booklet were asked to select tasks they felt required some structured training for entry-level personnel and then indicate how much training emphasis these tasks should receive, from 1 (extremely low emphasis) to 10 (extremely high emphasis). Structured training is defined as training provided at resident technical schools, field training detachments (FTDs), mobile training teams, formal on-the-job training (OJT), or any other organized training method. There was very good agreement among the 47 raters as to which tasks required some form of structured training and which do not. The average TE rating was 2.65, with a standard deviation of 1.66. Any task with a TE rating of 4.31 or above is considered to have high training emphasis.

TABLE 1

MAJCOM REPRESENTATION OF AFSC 2A6X6 SAMPLE

| MAJCOM | PERCENT OF ASSIGNED* | PERCENT OF SAMPLE |
|---|---|---|
| USAFE | 4 | 4 |
| AETC | 7 | 7 |
| PACAF | 6 | 6 |
| ACC | 25 | 26 |
| AMC | 15 | 14 |
| AFMC | 3 | 4 |
| AFSOC | 4 | 3 |
| AG | 17 | 20 |
| AFR | 20 | 16 |

| | AFSC 2A6X6 ACTIVE DUTY | AFSC 2A6X6 GUARD | AFSC 2A6X6 RESERVE |
|---|---|---|---|
| TOTAL ASSIGNED | 3,920 | 1,233 | 1,050 |
| TOTAL ELIGIBLE | 3,522 | 1,181 | 986 |
| TOTAL IN SAMPLE | 1,161 | 362 | 300 |
| PERCENT OF ASSIGNED IN SAMPLE | 30% | 29% | 29% |
| PERCENT OF ELIGIBLE IN SAMPLE | 33% | 31% | 30% |

* Assigned strength as of October 1996

** Excludes personnel in PCS, student, or hospital status, or less than 6 weeks on the job

TABLE 2

PAYGRADE DISTRIBUTION OF SURVEY SAMPLE

| | PERCENT OF ACTIVE DUTY | | PERCENT OF AIR RESERVE | | PERCENT OF AIR GUARD | |
|---|---|---|---|---|---|---|
| PAYGRADE | ASSIGNED | SAMPLE | ASSIGNED | SAMPLE | ASSIGNED | SAMPLE |
| E-1 to E-3 | 26 | 25 | 1 | - | 4 | 2 |
| E-4 | 25 | 26 | 16 | 10 | 20 | 15 |
| E-5 | 26 | 26 | 45 | 45 | 39 | 41 |
| E-6 | 13 | 14 | 27 | 31 | 26 | 27 |
| E-7 | 10 | 9 | 11 | 14 | 11 | 14 |
| E-8 | <1 | - | <1 | - | <1 | - |
| E-9 | - | - | - | - | - | - |

* Assigned strength as of October 1996

NOTE: Columns may not add to 100 percent due to rounding

**Task Difficulty (TD)**. TD is an estimate of the amount of time needed to learn how to do each task satisfactorily. The 46 senior NCOs who completed TD booklets were asked to rate the difficulty of each task using a 10-point scale (i.e., extremely low to extremely high). Ratings were standardized so tasks have an average difficulty of 5.00, with a standard deviation of 1.00. Any task with a TD rating of 6.00 or above is considered difficult to learn.

When used in conjunction with the primary criterion of percent members performing, TD and TE ratings can provide insight into first-enlistment personnel training requirements. Such insights may suggest a need for lengthening or shortening portions of instruction supporting Air Force Specialty entry-level jobs.

## SPECIALTY JOBS
(Career Ladder Structure)

The occupational analysis process begins with an examination of the career ladder structure. The structure of jobs within the Aircraft Electrical and Environmental Systems career ladder was examined on the basis of similarity of tasks performed and the relative percent of time spent ratings provided by job incumbents, independent of other specialty background factors.

The first step in the analysis process is to identify the structure of the career ladder in terms of the jobs performed by respondents. The Comprehensive Occupational Data Analysis Program (CODAP) assists by creating an individual job description for each respondent based on the tasks performed and the relative amount of time spent on tasks. The CODAP automated job clustering program then compares all the individual job descriptions, locates the two descriptions with the most similar tasks and time spent ratings, and combines them to form a composite job description. In successive stages, new members are added to this initial group, or new groups are formed based on the similarity of tasks and time spent ratings.

The basic group used in this hierarchical clustering process is the *Job*. When two or more jobs have a substantial degree of similarity in tasks performed and time spent on tasks, they are grouped together and identified as a *Cluster*. The structure of the career ladder is then defined in terms of jobs and clusters of jobs. The resulting job structure information can be used to evaluate the accuracy of career ladder documents (i.e., AFMAN 36-2108 *Specialty Descriptions*, the Career Field Education and Training Plan, and STSs), as well as to gain a better understanding of current utilization patterns. The above terminology will be used in the discussion of the AFSC 2A6X6 career ladder structure.

## Overview of Specialty Jobs

A listing of these jobs and job clusters is provided below. The stage (STG) number shown beside each title references computer printed information, the letter "N" represents the number of personnel in each group. Figure 1 illustrates the division of jobs performed by AFSC 2A6X6 personnel.

I. POWER JOB (STG134, N=18)

II. FLIGHTLINE CLUSTER (STG083, N=1,274)

III. BACKSHOP CLUSTER (STG107, N=172)

IV. OXYGEN JOB (STG125, N=12)

V. TRAINING CLUSTER (STG084, N=30)

VI. QUALITY ASSURANCE INSPECTOR JOB (STG127, N=11)

VII. SUPERVISOR CLUSTER (STG099, N=86)

VIII. SAFETY INSPECTOR JOB (STG122, N=12)

The respondents forming these jobs account for 89 percent of the survey sample. The remaining 11 percent were performing tasks or series of tasks which did not group with any of the defined jobs. Some job titles for these individuals include: Rotary Wing Program Manager. Dayshift Lead Technician, Resource Advisor, Squadron Mobility NCO, and Aviation Maintenance Manager.

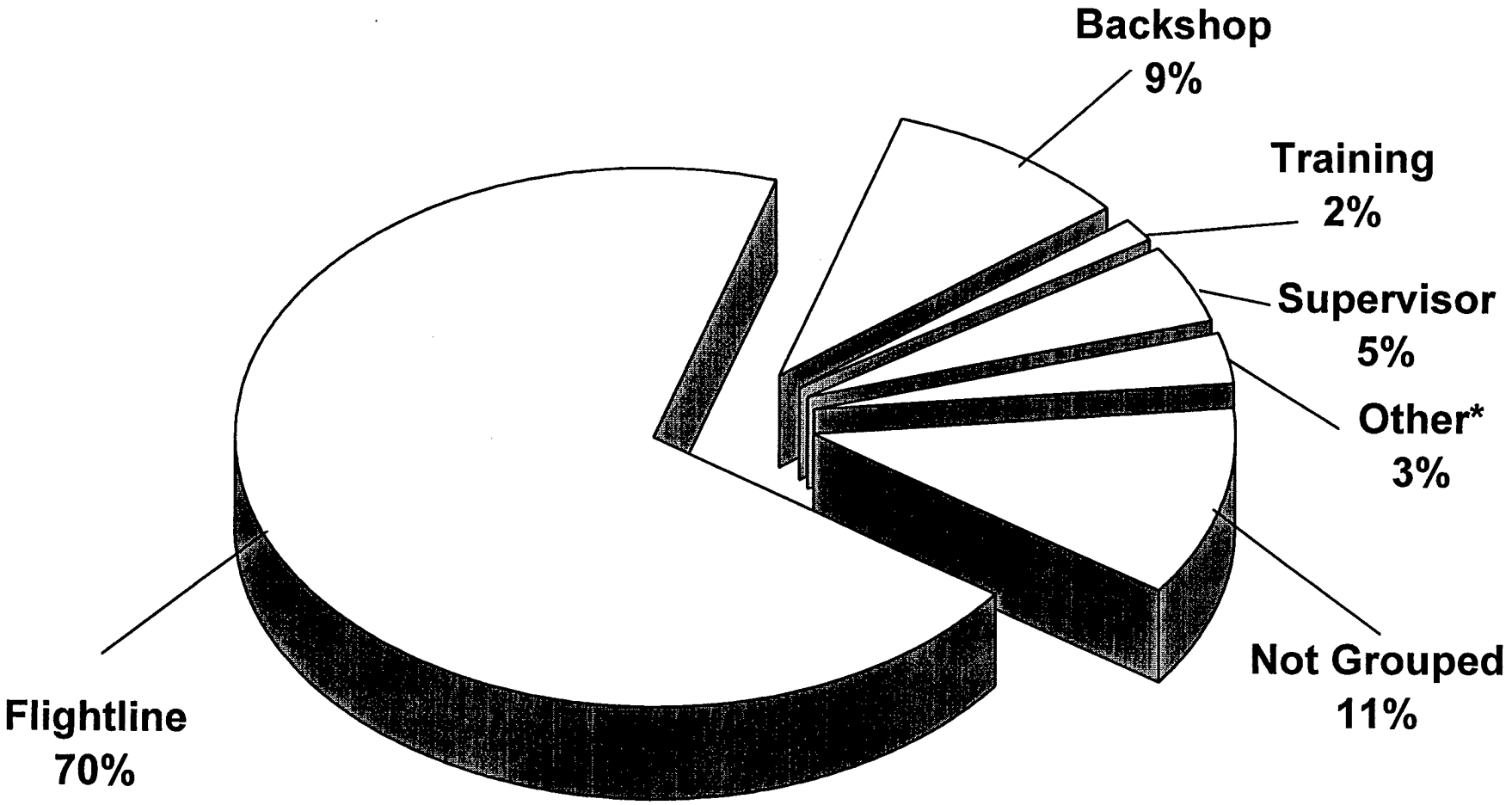
## Group Descriptions

The following paragraphs contain brief descriptions of the jobs and clusters identified through the career ladder structure analysis. Table 3 presents the relative time spent on duties by members of these specialty jobs, while Table 4 provides demographic information for each job discussed within this report. Representative tasks for all the groups are contained in Appendix A1.

I. POWER JOB (STG018). The 18 members of this job compromise less than 1 percent of the survey sample. Personnel in the Power Job work primarily with aircraft power systems. This includes working with AC and DC power systems, isolating malfunctions, removing and installing power components and inspecting power components. Over 36 percent

# FIGURE 1

## 2A6X6 CAREER LADDER JOBS




Others includes: Power, Oxygen, Quality Inspector, and Safety Inspector

TABLE 3

RELATIVE PERCENT TIME SPENT PERFORMING DUTIES BY SPECIALTY JOBS

| DUTIES | POWER (STG134) (N=18) | FLIGHTLINE (STG083) (N=1274) | BACKSHOP (STG107) (N=172) | OXYGEN (STG125) (N=12) |
|---|---|---|---|---|
| A PERFORMING AIRCRAFT ELECTRICAL AND ENVIRONMENTAL FUNDAMENTAL MAINTENANCE | 28 | 8 | 14 | 8 |
| B MAINTAINING AIRCRAFT POWER AND DISTRIBUTION SYSTEMS | 36 | 11 | 8 | 2 |
| C MAINTAINING ENGINE START AND IGNITION CONTROL SYSTEMS | 2 | 1 | * | - |
| D MAINTAINING LANDING GEAR SYSTEMS | 5 | 6 | 2 | 1 |
| E MAINTAINING CARGO DOOR AND RAMP SYSTEMS | 2 | 1 | * | - |
| F MAINTAINING FUEL AND WATER INJECTION SYSTEMS | 1 | 1 | * | * |
| G MAINTAINING FLIGHT CONTROL SYSTEMS | 2 | 3 | 1 | - |
| H MAINTAINING BATTERIES | 4 | 2 | 8 | 16 |
| I MAINTAINING MASTER CAUTION AND WARNING SYSTEMS | 1 | 3 | 1 | 1 |
| J MAINTAINING FIRE AND OVERHEAT WARNING SYSTEMS | 2 | 3 | 1 | * |
| K MAINTAINING LIGHTING SYSTEMS | 4 | 6 | 7 | * |
| L MAINTAINING ANTI-ICING SYSTEMS | * | 2 | * | 1 |
| M MAINTAINING AIRCRAFT FIRE EXTINGUISHING SYSTEMS | 1 | 3 | 1 | * |
| N MAINTAINING AIRCRAFT OXYGEN SYSTEMS AND ASSOCIATED EQUIPMENT | 4 | 8 | 19 | 30 |
| O MAINTAINING AIRCRAFT PRESSURIZATION SYSTEMS | 1 | 4 | 1 | - |
| P MAINTAINING AUXILIARY AIR AND BLEED AIR DISTRIBUTION SYSTEMS | 2 | 7 | 1 | - |
| Q MAINTAINING AIRCRAFT LIQUID COOLANT AND LIQUID CYCLE REFRIGERATION SYSTEMS | - | 1 | * | - |
| R MAINTAINING AIRCRAFT AIR-CONDITIONING SYSTEMS | 4 | 7 | 2 | - |
| S MAINTAINING MISCELLANEOUS ELECTRICAL ENVIRONMENTAL CONTROL SYSTEMS | 1 | 2 | 11 | 15 |
| T PERFORMING GENERAL AIRCRAFT AND CROSS UTILIZATION TRAINING (CUT) ACTIVITIES | 1 | 8 | 1 | 1 |
| U PERFORMING MANAGEMENT AND SUPERVISORY ACTIVITIES | * | 4 | 8 | 1 |
| V PERFORMING TRAINING ACTIVITIES | * | 2 | 3 | 1 |
| W PERFORMING GENERAL ADMINISTRATIVE AND TECHNICAL ORDER SYSTEM ACTIVITIES | - | 1 | 1 | 4 |
| X PERFORMING GENERAL SUPPLY AND EQUIPMENT ACTIVITIES | * | 1 | 3 | 11 |
| Y PERFORMING MAINTENANCE MANAGEMENT ACTIVITIES | 1 | 5 | 7 | 9 |

* Denotes less than 1 percent

TABLE 3 (CONTINUED)

RELATIVE PERCENT TIME SPENT PERFORMING DUTIES BY SPECIALTY JOBS

| DUTIES | TRAINING (STG 084) (N=30) | QA INSPECTOR (STG127) (N=11) | SUPERVISOR (STG099) (N=86) | SAFETY (STG012) (N=12) |
|---|---|---|---|---|
| A PERFORMING AIRCRAFT ELECTRICAL AND ENVIRONMENTAL FUNDAMENTAL MAINTENANCE | 4 | 4 | 1 | 1 |
| B MAINTAINING AIRCRAFT POWER AND DISTRIBUTION SYSTEMS | 4 | 4 | 1 | * |
| C MAINTAINING ENGINE START AND IGNITION CONTROL SYSTEMS | * | 1 | * | - |
| D MAINTAINING LANDING GEAR SYSTEMS | 1 | 3 | * | - |
| E MAINTAINING CARGO DOOR AND RAMP SYSTEMS | * | * | * | - |
| F MAINTAINING FUEL AND WATER INJECTION SYSTEMS | * | * | * | - |
| G MAINTAINING FLIGHT CONTROL SYSTEMS | 2 | 3 | * | - |
| H MAINTAINING BATTERIES | 1 | 1 | * | * |
| I MAINTAINING MASTER CAUTION AND WARNING SYSTEMS | 1 | 1 | * | - |
| J MAINTAINING FIRE AND OVERHEAT WARNING SYSTEMS | 1 | 1 | * | - |
| K MAINTAINING LIGHTING SYSTEMS | 2 | 2 | * | - |
| L MAINTAINING ANTI-ICING SYSTEMS | * | 1 | * | - |
| M MAINTAINING AIRCRAFT FIRE EXTINGUISHING SYSTEMS | * | 1 | * | * |
| N MAINTAINING AIRCRAFT OXYGEN SYSTEMS AND ASSOCIATED EQUIPMENT | 1 | 3 | * | - |
| O MAINTAINING AIRCRAFT PRESSURIZATION SYSTEMS | 1 | 2 | * | - |
| P MAINTAINING AUXILIARY AIR AND BLEED AIR DISTRIBUTION SYSTEMS | 1 | 3 | * | - |
| Q MAINTAINING AIRCRAFT LIQUID COOLANT AND LIQUID CYCLE REFRIGERATION SYSTEMS | * | * | * | - |
| R MAINTAINING AIRCRAFT AIR-CONDITIONING SYSTEMS | 1 | 2 | * | - |
| S MAINTAINING MISCELLANEOUS ELECTRICAL ENVIRONMENTAL CONTROL SYSTEMS | * | 2 | * | * |
| T PERFORMING GENERAL AIRCRAFT AND CROSS UTILIZATION TRAINING (CUT) ACTIVITIES | 1 | 4 | 1 | - |
| U PERFORMING MANAGEMENT AND SUPERVISORY ACTIVITIES | 21 | 27 | 57 | 78 |
| V PERFORMING TRAINING ACTIVITIES | 47 | 4 | 9 | 3 |
| W PERFORMING GENERAL ADMINISTRATIVE AND TECHNICAL ORDER SYSTEM ACTIVITIES | 4 | 7 | 6 | 12 |
| X PERFORMING GENERAL SUPPLY AND EQUIPMENT ACTIVITIES | 3 | 2 | 5 | 2 |
| Y PERFORMING MAINTENANCE MANAGEMENT ACTIVITIES | 2 | 23 | 20 | 4 |

* Denotes less than 1 percent

TABLE 4

SELECTED BACKGROUND DATA FOR SPECIALTY JOBS

| | POWER (STG134) | FLIGHTLINE (STG083) | BACKSHOP (STG107) | OXYGEN (STG125) |
|---|---|---|---|---|
| NUMBER IN GROUP | 18 | 1274 | 172 | 12 |
| PERCENT OF SAMPLE | 1% | 69% | 9% | <1% |
| PERCENT IN CONUS | 94 | 85 | 72 | 75 |
| DAFSC DISTRIBUTION: | | | | |
| 2A636 | 22% | 18% | 38% | 50% |
| 2A656 | 67% | 57% | 47% | 50% |
| 2A676 | 11% | 24% | 15% | 0% |
| COMPONENT STATUS | | | | |
| ACTIVE DUTY | 50% | 57% | 95% | 92% |
| AIR FORCE RESERVES (AFRES) | 6% | 20% | 4% | 8% |
| AIR NATIONAL GUARD (ANG) | 45% | 23% | 1% | 0% |
| PAYGRADE DISTRIBUTION | | | | |
| E-1 to E-3 | 11% | 14% | 34% | 50% |
| E-4 | 39% | 23% | 23% | 25% |
| E-5 | 33% | 35% | 28% | 17% |
| E-6 | 17% | 21% | 12% | 8% |
| E-7 | 0% | 7% | 3% | 0% |
| E-8 | 0% | 0% | 0% | 0% |
| E-9 | 0% | 0% | 0% | 0% |
| PERCENT SUPERVISING | 17% | 39% | 44% | 8% |
| AVERAGE NUMBER OF TASKS PERFORMED | 64 | 193 | 119 | 49 |

* Denotes less than 1 percent

TABLE 4 (CONTINUED)

SELECTED BACKGROUND DATA FOR SPECIALTY JOBS

| | TRAINING (STG084) | QA INSPECTOR (STG127) | SUPERVISOR (STG099) | SAFETY (STG012) |
|---|---|---|---|---|
| NUMBER IN GROUP | 30 | 11 | 86 | 12 |
| PERCENT OF SAMPLE | 1% | <1% | 5% | <1% |
| PERCENT IN CONUS | 93 | 73 | 83 | 67 |
| DAFSC DISTRIBUTION: | | | | |
| 2A636 | 0% | 55% | 0% | 0% |
| 2A656 | 73% | 45% | 8% | 25% |
| 2A676 | 27% | 0% | 92% | 75% |
| COMPONENT STATUS | | | | |
| ACTIVE DUTY | 100% | 91% | 86% | 100% |
| AIR FORCE RESERVES (AFRES) | 0% | 0% | 7% | 0% |
| AIR NATIONAL GUARD (ANG) | 0% | 9% | 7% | 0% |
| PAYGRADE DISTRIBUTION | | | | |
| E-1 to E-3 | 0% | 0% | 0% | 0% |
| E-4 | 0% | 0% | 1% | 0% |
| E-5 | 60% | 36% | 2% | 25% |
| E-6 | 27% | 27% | 21% | 17% |
| E-7 | 13% | 36% | 74% | 58% |
| E-8 | 0% | 0% | 1% | 0% |
| E-9 | 0% | 0% | 0% | 0% |
| PERCENT SUPERVISING | 77% | 36% | 87% | 33% |
| AVERAGE NUMBER OF TASKS PERFORMED | 66 | 93 | 74 | 32 |

* Denotes less than 1 percent

of their job time is spent performing these activities, more time than members of any other job. The members of this job perform an average of 64 tasks, which is fairly low when compared to most of the other jobs. The low number of tasks suggests that this job is fairly specialized with members performing a small number of tasks concerning power systems. Members of this job are distinguished by the time they spend on the following tasks:

perform operational checks of AC power systems
remove or install AC power components
perform operational checks of DC power systems
isolate AC power malfunctions
remove or install DC power components
isolate DC power malfunctions
inspect AC power components
perform operational checks of external power systems

Most of the personnel in this job hold the 5-skill level and are in paygrades E-4 and E-5. Only 17 percent report having supervisory responsibilities.

II. FLIGHTLINE CLUSTER (STG083). Comprising 69 percent of the survey sample, this core job includes 1,274 members who are responsible for flightline related duties. Much of their time is spent performing operational checks, inspecting, isolating problems, and removing and installing a wide variety of components. Eleven percent of their time is spent maintaining aircraft power and distribution systems. One reason for the wide variety of duties performed in this cluster is the nature of the job itself. The cluster did not break down by aircraft, so the Flightline Cluster includes all types of aircraft. This includes fighter, cargo, and transport aircraft. The core tasks performed on each of these aircraft were similar; however, small differences in the tasks performed may have caused the wide range of duties performed. Two jobs were also identified in this cluster. Personnel within the Battery Job performed mostly battery related duties, such as cleaning and replacing batteries. Personnel in the General Maintenance Job performed a variety of general maintenance activities, such as aircraft towing tasks. Personnel in the Flightline Cluster perform an average of 193 tasks. This number is high when compared to other clusters and jobs. Some of the tasks which distinguish this cluster are:

crimp splices or terminals to wires
perform operational checks of AC power systems
perform operational checks of air-conditioning systems
perform operational checks of exterior lighting
perform operational checks of interior lighting
assemble or disassemble connector plugs
remove or install bleed air system components
inspect wire bundles or harnesses
perform operational checks of anti-skid systems

The predominant skill level for this cluster was the 5-skill level with the 7-skill level following. The majority of the personnel in the Flightline Cluster are paygrade E-4 and E-5. Thirty-nine percent of the personnel in this cluster report supervising others, which is about average compared to other clusters and jobs.

III. BACKSHOP CLUSTER (STG107). The 172 members in this cluster are tasked with the duties that typically are not accomplished on the flightline. In fact, the duty location is the primary factor that separated this cluster from the Flightline Cluster. Members in this cluster are responsible for a variety of tasks, including battery and oxygen related tasks. Ninety-five percent of the members of this cluster are active duty, with only 4 percent AFRES and 1 percent ANG. The members of this cluster comprise 9 percent of the sample, which makes it the second largest job identified. Nineteen percent of their time is spent maintaining aircraft oxygen systems, while 14 percent is spent performing aircraft electrical and environmental maintenance. Three separate jobs were identified in this cluster. The backshop supervisors did almost exclusively supervisory-related tasks. Backshop managers did a combination of supervisory and technical tasks. Finally, the backshop technicians did almost all technical tasks with very few supervisory tasks. Overall, an average of 119 tasks are performed by personnel in this cluster, which is the second highest, and fairly high when compared to the other clusters and jobs. Tasks that distinguish this cluster include:

clean batteries
assemble or disassemble batteries
perform capacitance tests and service batteries
inspect LOX servicing carts
crimp splices or terminals to wires
isolate LOX servicing cart malfunctions
bench check exterior lighting components
clean connector plugs
inspect liquid nitrogen servicing carts

The majority of the personnel in this cluster are 5-skill level. A high percentage of personnel also are 3-skill level, with only 15 percent of the cluster at the 7-skill level. The E-1 to E-3 paygrade had the highest percentage of personnel, which is second only to the Oxygen Job at this paygrade level.

IV. OXYGEN JOB (STG125). Eleven of the 12 members in this job are active duty, with the remaining member AFRES. This job comprises less than 1 percent of the survey sample. Members of this job primarily maintain liquid oxygen (LOX) and gaseous oxygen (GOX) systems. This includes inspecting, isolating malfunctions, and removing and installing

components. Thirty percent of their time is spent on oxygen systems, which is higher than any other job group. An average of 49 tasks are performed, which is the second lowest when compared to other jobs. Most of those tasks are very specialized to oxygen duties. Working with batteries and maintaining miscellaneous electrical environmental control systems are also important skills for members of this job. Some tasks which are representative of the job are:

purge LOX servicing carts
remove or install LOX servicing cart components
perform leakage checks of LOX servicing carts
inspect LOX servicing carts
perform operational checks of LOX servicing carts
perform operational checks of GOX servicing carts
isolate LOX servicing cart malfunctions
perform leakage checks of GOX servicing carts

The personnel in the Oxygen Job are split between the 3- and 5-skill level, with 50 percent in each. The predominant paygrades are E-1 to E-3, which account for 50 percent of the members of this job. There are not any members above E-6. The percent supervising is only 8 percent for this job, which is the lowest of any job group.

V. TRAINING CLUSTER (STG084). The 30 members of this cluster represent 1 percent of the survey sample. The Training Cluster is the third largest cluster or job identified. Members of this cluster are responsible for the formal training of job incumbents. Two distinct jobs were identified within this cluster. The first job identified those members who worked only as instructors. Typically, this was the classroom, formal instruction. Members in the second job also were instructors but were also performing a large amount of technical duties. Members of this second job were "On-the-Job Training" instructors rather than classroom instructors. Members of this cluster performed an average of 66 tasks. This is about average when compared to the other job groups. Members in the Training Cluster spend 47 percent of their time performing training activities. That is much higher than any other cluster or job. In addition, 21 percent of their time is spent performing management and supervisory activities. Representative tasks performed by members of this cluster include:

conduct formal course classroom training
administer or score tests
demonstrate operation of equipment
evaluate progress of trainees
develop training materials or aids
personalize lesson plans
demonstrate how to locate technical information
develop performance tests

Seventy-three percent of the members in the Training Cluster are at the 5-skill level, while the other 27 percent are at the 7-skill level. All of the members in this cluster are active duty. Most of the personnel are E-5 and E-6 paygrades. Seventy-seven percent of the personnel report supervising other personnel.

VI. QUALITY ASSURANCE INSPECTOR JOB (STG127). The 11 members forming this group are primarily responsible for quality assurance functions. Members of this job perform duties such as inspecting records, observing work procedures, and evaluating procedures, all of which are directly related to quality assurance. Twenty-seven percent of their time is spent performing management and supervisory activities and 23 percent is spent performing maintenance management activities. Most of the members of this job report working in a Quality Assurance office. The average number of tasks performed was 93 for members in the Quality Assurance Inspector Job. This job is distinguished by the following tasks:

evaluate maintenance procedures
complete accident or incident reports
analyze Core Automated Maintenance System (CAMS) data
initiate technical order improvement reports
observe in-process maintenance or initiate on-the-spot corrections
review publishing bulletins or technical order changes
write inspection reports
perform maintenance activity inspections or self-inspections

Fifty-five percent of the quality assurance inspectors are at the 3-skill level with the other 45 percent at the 7-skill level. Thirty-six percent of the personnel in this job have the E-5 paygrade and 36 percent also are at the E-7 paygrade. Ninety-one percent are active duty and 9 percent are ANG. Thirty-six percent report supervising, which is about average when compared to the other jobs.

VII. SUPERVISOR CLUSTER (STG099). The 86 members comprising this cluster represent 5 percent of the sample. There are two separate jobs within the Supervisor Cluster. The first job is purely a supervisory one. Members of this job are responsible for such tasks as determining work assignments, writing performance reports, and counseling subordinates. Maintenance supervisors comprise the second job within the Supervisor Cluster. Members of this job are responsible for tasks such as coordinating aircraft maintenance activities and reviewing aircraft maintenance records. Both of these jobs are similar with members in each respective job performing primarily supervisory tasks. The maintenance supervisors, however, perform unique tasks specific to maintenance. The majority of the personnel report working in a maintenance shop. Members of the Supervisor Cluster report spending 57 percent of their time

performing management and supervisory activities and 20 percent of their time is spent performing maintenance management activities. Personnel in this cluster perform an average of 74 tasks, which is about average compared to other jobs. Representative tasks performed by members of this cluster include:

supervise military personnel
determine or establish work assignments or priorities
develop or establish work schedules
evaluate personnel for compliance with performance standards
write performance reports or supervisory appraisals
coordinate aircraft maintenance activities with maintenance control
evaluate maintenance procedures
conduct self-inspections or self-assessments

Ninety-two percent of the members in the Supervisor Cluster are at the 7-skill level and 8 percent are at the 5-skill level. Seventy-four percent are paygrade E-7. Eighty-seven percent report supervisory responsibilities, which is much higher than any other job or cluster.

VIII. SAFETY INSPECTOR JOB (STG122). The 12 members of this job account for less than 1 percent of the survey population. Personnel in this job primarily inspect for work hazards and safety in the work areas. Much of the job time is spent in performing management and supervisory activities (78 percent) while 12 percent of their time is spent performing general administrative and technical order system activities. Members of this job perform an average of only 32 tasks. This is the lowest number of tasks performed, and indicates a very highly specialized job. There are no ANG or AFRES members performing this job. Tasks which best differentiate this job from others are:

conduct self-inspections or self-assessments
conduct safety inspections of equipment or facilities
evaluate accident or incident reports
evaluate job hazards or compliance with Air Force Occupational Safety and Health (AFOSH) Program
write inspection reports
plan safety or security programs
complete accident or incident reports
investigate accidents or incidents

Three-quarters of the personnel in this job are 7-skill level, with 25 percent at the 5-skill level. The predominant paygrade is E-7. Only 33 percent of the personnel report supervising, which is slightly lower than average.

Comparison of Current Jobs to Previous Survey Findings

Results of the specialty job analysis were compared to those of the last Aircraft Electrical and Environmental Systems OSR published in 1993. With some variance in the job titles between the two studies, the tasks that personnel performed in the previous OSR are generally found in the current study. As shown in Table 5, the majority of jobs identified previously were also identified in this study. The current OSR groups several of the jobs from the previous OSR into clusters. For example, the Technical Training Instructor and the Field Training Detachment (FTD) Instructor jobs from the previous OSR are now in the Training Cluster. Conversely, the previous OSR had battery and oxygen cart maintenance clustered together, while the current study identifies them as independent jobs. The Airborne Warning and Control System (AWACS) Job, the Maintenance Scheduling Job, the Wiring Job, and the Helicopter Cluster from the previous OSR were not similar to any of the jobs or clusters identified in the current study.

Summary

Utilizing the special job-identifying techniques described at the beginning of this section, eight jobs were identified in the career ladder structure analysis. The eight jobs were directly involved in performing the full range of duties and responsibilities of the Aircraft Electrical and Environmental systems career field.

The majority of the personnel are involved in jobs that center around the flightline with almost three quarters of the personnel grouped as flightline personnel. Most job groups have similar tasks that involve inspecting, troubleshooting, removing, repairing and installing components. Current results largely follow the historical career structure with the major changes involving the deletion of the AWACS, Maintenance Scheduling, Wiring, and Helicopter jobs.

## ANALYSIS OF DAFSC GROUPS

An analysis of DAFSC groups, in conjunction with the analysis of the career ladder structure, is an important part of each occupational survey. The DAFSC analysis identifies differences in tasks performed at the various skill levels. This information may then be used to evaluate how well career ladder documents, such as the AFMAN 36-2108 *Specialty Description* and the STS, reflect what career ladder personnel are actually doing in the field.

The distribution of skill-level groups across the career ladder jobs is displayed in Table 6, while Table 7 offers another perspective by displaying the average percent time spent on each duty across the skill-level groups. Both 3- and 5-skill level groups perform mostly technical

TABLE 5

COMPARISON OF JOB GROUPS IN CURRENT STUDY
TO PREVIOUS STUDY

| | 1997 STUDY (N=1,823) | PERCENT OF SAMPLE | | 1993 STUDY (N=2,931) | PERCENT OF SAMPLE |
|---|---|---|---|---|---|
| I. | POWER | 1 | I. | NOT IDENTIFIED | - |
| II. | FLIGHTLINE | 69 | II. | FLIGHTLINE MAINTENANCE | 53 |
| III. | BACKSHOP | 9 | III. | IN-SHOP MAINTENANCE | 17 |
| IV. | OXYGEN | <1 | IV. | BATTERY, OXYGEN CART MAINTENANCE | 1 |
| V. | TRAINING | 1 | V. | TECHNICAL TRAINING INSTRUCTOR AND FTD INSTRUCTOR | 2 |
| VI. | QUALITY ASSURANCE INSPECTOR | <1 | VI. | QUALITY ASSURANCE | 1 |
| VII. | SUPERVISORS | 5 | VII. | SUPERVISOR | 7 |
| VIII. | SAFETY INSPECTOR | <1 | VIII. | NOT IDENTIFIED | - |
| IX. | NOT IDENTIFIED | - | IX. | HELICOPTER | 1 |
| X. | NOT IDENTIFIED | - | X. | CROSS-UTILIZATION TRAINING | <1 |
| XI. | NOT IDENTIFIED | - | XI. | WIRING | <1 |
| XII. | NOT IDENTIFIED | - | XII. | MAINTENANCE SCHEDULING | <1 |
| XIII. | NOT IDENTIFIED | - | XIII. | AIRBORNE WARNING AND CONTROL SYSTEM (AWACS) | <1 |

TABLE 6

DISTRIBUTION OF AFSC 2A6X6 MEMBERS ACROSS SPECIALTY JOBS
(PERCENT MEMBERS RESPONDING)

| SPECIALTY JOBS | DAFSC 2A636 | | | DAFSC 2A656 | | | | DAFSC 2A676 | | | |
|---|---|---|---|---|---|---|---|---|---|---|---|
| | TOTAL (N=356) | ACTIVE (N=341) | AFRES (N=15) | TOTAL (N=978) | ACTIVE (N=578) | ANG (N=225) | AFRES (N=175) | TOTAL (N=489) | ACTIVE (N=242) | ANG (N=137) | AFRES (N=110) |
| I. POWER | 1 | 1 | 7 | 1 | 1 | 3 | - | - | - | 2 | - |
| II. FLIGHTLINE | 65 | 65 | 73 | 75 | 70 | 81 | 82 | 64 | 39 | 88 | 88 |
| III. BACKSHOP | 19 | 19 | 13 | 8 | 14 | - | 2 | 5 | 9 | 1 | 2 |
| IV. OXYGEN | 2 | 2 | - | 1 | 1 | - | 1 | - | - | - | - |
| V. TRAINING | - | - | - | 2 | 4 | - | - | 2 | 3 | - | - |
| VI. QUALITY ASSURANCE INSPECTOR | - | - | - | 1 | 1 | - | - | 1 | 2 | - | - |
| VII. SUPERVISOR | - | - | - | 1 | 1 | - | - | 16 | 28 | 4 | 6 |
| VIII. SAFETY INSPECTOR | - | - | - | - | 1 | - | - | 2 | 4 | - | - |
| NOT GROUPED | 13 | 13 | 7 | 11 | 7 | 16 | 15 | 10 | 15 | 5 | 4 |

TABLE 7

AVERAGE PERCENT TIME SPENT PERFORMING DUTIES BY TOTAL DAFSC 2A6X6 GROUPS
(RELATIVE PERCENT OF JOB TIME)

| | DUTIES | DAFSC 2A636 (N=356) | DAFSC 2A656 (N=978) | DAFSC 2A676 (N=489) |
|---|---|---|---|---|
| A | PERFORMING AIRCRAFT ELECTRICAL AND ENVIRONMENTAL FUNDAMENTAL MAINTENANCE | 11 | 10 | 7 |
| B | MAINTAINING AIRCRAFT POWER AND DISTRIBUTION SYSTEMS | 12 | 10 | 7 |
| C | MAINTAINING ENGINE START AND IGNITION CONTROL SYSTEMS | 1 | 1 | 1 |
| D | MAINTAINING LANDING GEAR SYSTEMS | 6 | 6 | 4 |
| E | MAINTAINING CARGO DOOR AND RAMP SYSTEMS | 1 | 1 | 1 |
| F | MAINTAINING FUEL AND WATER INJECTION SYSTEMS | 1 | 1 | * |
| G | MAINTAINING FLIGHT CONTROL SYSTEMS | 2 | 3 | 2 |
| H | MAINTAINING BATTERIES | 4 | 3 | 2 |
| I | MAINTAINING MASTER CAUTION AND WARNING SYSTEMS | 2 | 2 | 2 |
| J | MAINTAINING FIRE AND OVERHEAT WARNING SYSTEMS | 2 | 2 | 2 |
| K | MAINTAINING LIGHTING SYSTEMS | 7 | 6 | 4 |
| L | MAINTAINING ANTI-ICING SYSTEMS | 1 | 2 | 1 |
| M | MAINTAINING AIRCRAFT FIRE EXTINGUISHING SYSTEMS | 2 | 2 | 2 |
| N | MAINTAINING AIRCRAFT OXYGEN SYSTEMS AND ASSOCIATED EQUIPMENT | 11 | 8 | 6 |
| O | MAINTAINING AIRCRAFT PRESSURIZATION SYSTEMS | 4 | 3 | 2 |
| P | MAINTAINING AUXILIARY AIR AND BLEED AIR DISTRIBUTION SYSTEMS | 6 | 6 | 4 |
| Q | MAINTAINING AIRCRAFT LIQUID COOLANT AND LIQUID CYCLE REFRIGERATION SYSTEMS | 1 | 1 | * |
| R | MAINTAINING AIRCRAFT AIR-CONDITIONING SYSTEMS | 7 | 6 | 5 |
| S | MAINTAINING MISCELLANEOUS ELECTRICAL ENVIRONMENTAL CONTROL SYSTEMS | 4 | 3 | 2 |
| T | PERFORMING GENERAL AIRCRAFT AND CROSS UTILIZATION TRAINING (CUT) ACTIVITIES | 7 | 7 | 4 |
| U | PERFORMING MANAGEMENT AND SUPERVISORY ACTIVITIES | 1 | 5 | 21 |
| V | PERFORMING TRAINING ACTIVITIES | 1 | 4 | 6 |
| W | PERFORMING GENERAL ADMINISTRATIVE AND TECHNICAL ORDER SYSTEM ACTIVITIES | * | 1 | 3 |
| X | PERFORMING GENERAL SUPPLY AND EQUIPMENT ACTIVITIES | 1 | 2 | 3 |
| Y | PERFORMING MAINTENANCE MANAGEMENT ACTIVITIES | 5 | 5 | 9 |

* Denotes less than 1 percent

NOTE: Columns may not add up to 100 percent due to rounding

duties, with 5-skill level personnel also performing some supervisory and training duties. Seven-skill level members report a large amount of their job time is spent on supervisory, training, and administrative duties (see Table 7, Duty U). This indicates a career ladder with a high level of technical task performance for all personnel up to and including 7-skill level personnel.

## Skill-Level Descriptions

**DAFSC 2A636**. The 356 airmen at the 3-skill level (representing 20 percent of the survey sample), perform an average of 123 tasks. This low number is expected because the personnel are primarily in their first enlistment and doing a small number of technical tasks. Sixty-five percent of the 3-skill level are grouped into the Flightline Cluster (Table 6). Tables 7-10 show average percent time spent performing duties by skill level. Table 7 includes the entire sample. Table 8 is broken down into active duty personnel only, while Tables 9 and 10 are broken down into ANG and AFRES respectively. As shown in Table 7, 34 percent of the respondents' time is spent performing fundamental maintenance, maintaining aircraft power and distribution systems, and maintaining oxygen systems. Their job focus is shown in Tables 11-13, which lists representative tasks performed by the 3-skill level incumbents for the total sample, active duty, and AFRES respondents. Very few differences were exhibited between the two separate components. Most tasks listed relate to Duty A, Performing Aircraft Electrical and Environmental Fundamental Maintenance. Very few respondents reported performing supervisory duties. The ANG did not have any respondents at the 3-skill level.

**DAFSC 2A656**. The 978 airmen in the 5-skill level (54 percent of the survey sample) perform an average of 162 tasks. Personnel are doing more tasks as they get more proficient in the tasks they learn at the 3-skill level. As with 3-skill level personnel, the largest percentages of 5-skill level incumbents work in either the Flightline or Backshop clusters. As shown in Table 7, 20 percent of the respondents' time is spent performing electrical and environmental fundamental maintenance, and maintaining aircraft power and distribution systems. Again, Tables 8-10 show similar information broken down by components. Tables 14-17 indicate that the time spent on tasks is very similar across Active Duty, ANG and AFRES members. These tables indicate that the 5-skill level members are performing a wide variety of tasks, which is expected at this level. Personnel at this level are performing mostly technical tasks such as removing and installing components and inspecting and troubleshooting components. Time spent on tasks is very similar across Active Duty, ANG and AFRES members. Tables 18-20 show those tasks which best differentiate the 3- and 5-skill levels.

**DAFSC 2A676**. The 489 NCOs in the 7-skill level (27 percent of the survey sample) perform an average of 174 tasks. Table 7 outlines the duties performed by the total sample 7-skill level, while Tables 8-10 show this same information broken down by component status. As Table 6 demonstrates, unlike their junior counterparts at the 3- and 5-skill levels, 16 percent of the total sample were grouped into the Supervisor Cluster. Active duty reported 28 percent of their personnel at the 7-skill level were in the Supervisor Cluster, with only 4 percent of the ANG and

TABLE 8

AVERAGE PERCENT TIME SPENT PERFORMING DUTIES BY ACTIVE DUTY DAFSC 2A6X6 GROUPS
(RELATIVE PERCENT OF JOB TIME)

| DUTIES | | DAFSC 2A636 (N=341) | DAFSC 2A656 (N=578) | DAFSC 2A676 (N=242) |
|---|---|---|---|---|
| A | PERFORMING AIRCRAFT ELECTRICAL AND ENVIRONMENTAL FUNDAMENTAL MAINTENANCE | 11 | 8 | 4 |
| B | MAINTAINING AIRCRAFT POWER AND DISTRIBUTION SYSTEMS | 12 | 10 | 5 |
| C | MAINTAINING ENGINE START AND IGNITION CONTROL SYSTEMS | 1 | 1 | 1 |
| D | MAINTAINING LANDING GEAR SYSTEMS | 6 | 5 | 3 |
| E | MAINTAINING CARGO DOOR AND RAMP SYSTEMS | 1 | 1 | * |
| F | MAINTAINING FUEL AND WATER INJECTION SYSTEMS | 1 | 1 | * |
| G | MAINTAINING FLIGHT CONTROL SYSTEMS | 2 | 2 | 1 |
| H | MAINTAINING BATTERIES | 4 | 2 | 1 |
| I | MAINTAINING MASTER CAUTION AND WARNING SYSTEMS | 2 | 2 | 1 |
| J | MAINTAINING FIRE AND OVERHEAT WARNING SYSTEMS | 2 | 2 | 1 |
| K | MAINTAINING LIGHTING SYSTEMS | 7 | 5 | 2 |
| L | MAINTAINING ANTI-ICING SYSTEMS | 1 | 1 | 1 |
| M | MAINTAINING AIRCRAFT FIRE EXTINGUISHING SYSTEMS | 2 | 2 | 1 |
| N | MAINTAINING AIRCRAFT OXYGEN SYSTEMS AND ASSOCIATED EQUIPMENT | 11 | 8 | 4 |
| O | MAINTAINING AIRCRAFT PRESSURIZATION SYSTEMS | 4 | 3 | 2 |
| P | MAINTAINING AUXILIARY AIR AND BLEED AIR DISTRIBUTION SYSTEMS | 6 | 5 | 2 |
| Q | MAINTAINING AIRCRAFT LIQUID COOLANT AND LIQUID CYCLE REFRIGERATION SYSTEMS | 1 | 1 | 1 |
| R | MAINTAINING AIRCRAFT AIR-CONDITIONING SYSTEMS | 7 | 5 | 3 |
| S | MAINTAINING MISCELLANEOUS ELECTRICAL ENVIRONMENTAL CONTROL SYSTEMS | 4 | 3 | 1 |
| T | PERFORMING GENERAL AIRCRAFT AND CROSS UTILIZATION TRAINING (CUT) ACTIVITIES | 7 | 8 | 4 |
| U | PERFORMING MANAGEMENT AND SUPERVISORY ACTIVITIES | 1 | 8 | 34 |
| V | PERFORMING TRAINING ACTIVITIES | 1 | 5 | 9 |
| W | PERFORMING GENERAL ADMINISTRATIVE AND TECHNICAL ORDER SYSTEM ACTIVITIES | * | 1 | 4 |
| X | PERFORMING GENERAL SUPPLY AND EQUIPMENT ACTIVITIES | 1 | 3 | 4 |
| Y | PERFORMING MAINTENANCE MANAGEMENT ACTIVITIES | 5 | 6 | 9 |

* Denotes less than 1 percent

NOTE: Columns may not add up to 100 percent due to rounding

TABLE 9

AVERAGE PERCENT TIME SPENT PERFORMING DUTIES BY ANG DAFSC 2A6X6 GROUPS
(RELATIVE PERCENT OF JOB TIME)

| DUTIES | DAFSC 2A656 (N=225) | DAFSC 2A676 (N=137) |
|---|---|---|
| A PERFORMING AIRCRAFT ELECTRICAL AND ENVIRONMENTAL FUNDAMENTAL MAINTENANCE | 12 | 9 |
| B MAINTAINING AIRCRAFT POWER AND DISTRIBUTION SYSTEMS | 12 | 10 |
| C MAINTAINING ENGINE START AND IGNITION CONTROL SYSTEMS | 1 | 1 |
| D MAINTAINING LANDING GEAR SYSTEMS | 6 | 6 |
| E MAINTAINING CARGO DOOR AND RAMP SYSTEMS | 1 | 1 |
| F MAINTAINING FUEL AND WATER INJECTION SYSTEMS | 1 | 1 |
| G MAINTAINING FLIGHT CONTROL SYSTEMS | 2 | 2 |
| H MAINTAINING BATTERIES | 6 | 4 |
| I MAINTAINING MASTER CAUTION AND WARNING SYSTEMS | 2 | 2 |
| J MAINTAINING FIRE AND OVERHEAT WARNING SYSTEMS | 3 | 2 |
| K MAINTAINING LIGHTING SYSTEMS | 8 | 6 |
| L MAINTAINING ANTI-ICING SYSTEMS | 2 | 2 |
| M MAINTAINING AIRCRAFT FIRE EXTINGUISHING SYSTEMS | 2 | 2 |
| N MAINTAINING AIRCRAFT OXYGEN SYSTEMS AND ASSOCIATED EQUIPMENT | 9 | 8 |
| O MAINTAINING AIRCRAFT PRESSURIZATION SYSTEMS | 4 | 4 |
| P MAINTAINING AUXILIARY AIR AND BLEED AIR DISTRIBUTION SYSTEMS | 6 | 6 |
| Q MAINTAINING AIRCRAFT LIQUID COOLANT AND LIQUID CYCLE REFRIGERATION SYSTEMS | 1 | * |
| R MAINTAINING AIRCRAFT AIR-CONDITIONING SYSTEMS | 7 | 6 |
| S MAINTAINING MISCELLANEOUS ELECTRICAL ENVIRONMENTAL CONTROL SYSTEMS | 2 | 2 |
| T PERFORMING GENERAL AIRCRAFT AND CROSS UTILIZATION TRAINING (CUT) ACTIVITIES | 5 | 4 |
| U PERFORMING MANAGEMENT AND SUPERVISORY ACTIVITIES | 1 | 7 |
| V PERFORMING TRAINING ACTIVITIES | 1 | 4 |
| W PERFORMING GENERAL ADMINISTRATIVE AND TECHNICAL ORDER SYSTEM ACTIVITIES | * | 2 |
| X PERFORMING GENERAL SUPPLY AND EQUIPMENT ACTIVITIES | 1 | 3 |
| Y PERFORMING MAINTENANCE MANAGEMENT ACTIVITIES | 4 | 8 |

* Denotes less than 1 percent

NOTE: Columns may not add up to 100 percent due to rounding

TABLE 10

AVERAGE PERCENT TIME SPENT PERFORMING DUTIES BY AFRES DAFSC 2A6X6 GROUPS
(RELATIVE PERCENT OF JOB TIME)

| | DUTIES | DAFSC 2A636 (N=15) | DAFSC 2A656 (N=175) | DAFSC 2A676 (N=110) |
|---|---|---|---|---|
| A | PERFORMING AIRCRAFT ELECTRICAL AND ENVIRONMENTAL FUNDAMENTAL MAINTENANCE | 13 | 11 | 8 |
| B | MAINTAINING AIRCRAFT POWER AND DISTRIBUTION SYSTEMS | 11 | 10 | 9 |
| C | MAINTAINING ENGINE START AND IGNITION CONTROL SYSTEMS | 1 | 1 | 1 |
| D | MAINTAINING LANDING GEAR SYSTEMS | 5 | 6 | 6 |
| E | MAINTAINING CARGO DOOR AND RAMP SYSTEMS | 2 | 2 | 2 |
| F | MAINTAINING FUEL AND WATER INJECTION SYSTEMS | 1 | 1 | 1 |
| G | MAINTAINING FLIGHT CONTROL SYSTEMS | 2 | 4 | 3 |
| H | MAINTAINING BATTERIES | 4 | 4 | 2 |
| I | MAINTAINING MASTER CAUTION AND WARNING SYSTEMS | 3 | 3 | 3 |
| J | MAINTAINING FIRE AND OVERHEAT WARNING SYSTEMS | 3 | 3 | 3 |
| K | MAINTAINING LIGHTING SYSTEMS | 8 | 7 | 6 |
| L | MAINTAINING ANTI-ICING SYSTEMS | 2 | 2 | 2 |
| M | MAINTAINING AIRCRAFT FIRE EXTINGUISHING SYSTEMS | 3 | 3 | 3 |
| N | MAINTAINING AIRCRAFT OXYGEN SYSTEMS AND ASSOCIATED EQUIPMENT | 12 | 7 | 7 |
| O | MAINTAINING AIRCRAFT PRESSURIZATION SYSTEMS | 3 | 3 | 3 |
| P | MAINTAINING AUXILIARY AIR AND BLEED AIR DISTRIBUTION SYSTEMS | 5 | 5 | 5 |
| Q | MAINTAINING AIRCRAFT LIQUID COOLANT AND LIQUID CYCLE REFRIGERATION SYSTEMS | 1 | * | * |
| R | MAINTAINING AIRCRAFT AIR-CONDITIONING SYSTEMS | 7 | 7 | 7 |
| S | MAINTAINING MISCELLANEOUS ELECTRICAL ENVIRONMENTAL CONTROL SYSTEMS | 3 | 2 | 2 |
| T | PERFORMING GENERAL AIRCRAFT AND CROSS UTILIZATION TRAINING (CUT) ACTIVITIES | 5 | 6 | 6 |
| U | PERFORMING MANAGEMENT AND SUPERVISORY ACTIVITIES | * | 3 | 9 |
| V | PERFORMING TRAINING ACTIVITIES | 1 | 2 | 5 |
| W | PERFORMING GENERAL ADMINISTRATIVE AND TECHNICAL ORDER SYSTEM ACTIVITIES | 1 | * | 1 |
| X | PERFORMING GENERAL SUPPLY AND EQUIPMENT ACTIVITIES | 1 | 1 | 2 |
| Y | PERFORMING MAINTENANCE MANAGEMENT ACTIVITIES | 4 | 3 | 5 |

* Denotes less than 1 percent

NOTE: Columns may not add up to 100 percent due to rounding

TABLE 11

REPRESENTATIVE TASKS PERFORMED BY ALL DAFSC 2A636 PERSONNEL

| TASKS | | PERCENT MEMBERS PERFORMING (N=356) |
|---|---|---|
| A17 | Crimp splices or terminals to wires | 92 |
| A4 | Assemble or disassemble connector plugs | 85 |
| A26 | Inspect wire bundles or harnesses | 79 |
| K193 | Perform operational checks of exterior lighting | 79 |
| A11 | Clean connector plugs | 77 |
| K194 | Perform operational checks of interior lighting | 76 |
| B54 | Perform operational checks of AC power systems | 74 |
| B59 | Remove or install AC power components | 73 |
| B56 | Perform operational checks of DC power systems | 71 |
| K196 | Remove or install interior lighting components | 71 |
| K195 | Remove or install exterior lighting components | 71 |
| K189 | Isolate exterior lighting malfunctions | 71 |
| R362 | Perform operational checks of air-conditioning systems | 70 |
| A32 | Perform time compliance technical orders (TCTOs) modifications | 70 |
| B61 | Remove or install DC power components | 70 |
| A24 | Inspect electrical bonds or grounds | 69 |
| D96 | Perform operational checks of anti-skid systems | 68 |
| B49 | Isolate AC power malfunctions | 68 |
| K190 | Isolate interior lighting malfunctions | 68 |
| R366 | Remove or install air-conditioning system components | 67 |
| J178 | Perform operational checks of fire and overheat warning systems | 67 |
| B43 | Inspect AC power components | 67 |
| D102 | Remove or install anti-skid components | 66 |
| K187 | Inspect exterior lighting components | 66 |
| B51 | Isolate DC power malfunctions | 66 |
| K188 | Inspect interior lighting components | 65 |
| R359 | Perform leakage checks of air-conditioning systems | 64 |
| K183 | Assemble or disassemble exterior lighting assemblies | 64 |
| B45 | Inspect DC power components | 64 |
| P323 | Remove or install bleed air system components | 63 |
| P316 | Perform operational checks of bleed air systems | 63 |
| D84 | Inspect anti-skid components | 63 |
| R352 | Inspect air-conditioning systems | 62 |
| R355 | Isolate air-conditioning system malfunctions | 62 |
| P312 | Perform leakage checks of bleed air systems | 62 |
| B58 | Perform operational checks of external power systems | 62 |
| D90 | Isolate anti-skid malfunctions | 62 |
| O276 | Perform leakage checks of cabin or cargo pressurization systems | 60 |
| P297 | Inspect bleed air systems | 60 |

* Average Number of Tasks Performed -123

TABLE 12

REPRESENTATIVE TASKS PERFORMED BY ACTIVE DUTY 2A636 PERSONNEL

| TASKS | | PERCENT MEMBERS PERFORMING (N=341) |
|---|---|---|
| A17 | Crimp splices or terminals to wires | 92 |
| A4 | Assemble or disassemble connector plugs | 85 |
| K193 | Perform operational checks of exterior lighting | 79 |
| A26 | Inspect wire bundles or harnesses | 78 |
| A11 | Clean connector plugs | 76 |
| K194 | Perform operational checks of interior lighting | 76 |
| B59 | Remove or install AC power components | 73 |
| B54 | Perform operational checks of AC power systems | 73 |
| B56 | Perform operational checks of DC power systems | 71 |
| K196 | Remove or install interior lighting components | 71 |
| K195 | Remove or install exterior lighting components | 71 |
| A32 | Perform time compliance technical orders (TCTOs) modifications | 70 |
| B61 | Remove or install DC power components | 70 |
| K189 | Isolate exterior lighting malfunctions | 70 |
| R362 | Perform operational checks of air-conditioning systems | 69 |
| A24 | Inspect electrical bonds or grounds | 69 |
| D96 | Perform operational checks of anti-skid systems | 68 |
| K190 | Isolate interior lighting malfunctions | 68 |
| R366 | Remove or install air-conditioning system components | 67 |
| B49 | Isolate AC power malfunctions | 67 |
| J178 | Perform operational checks of fire and overheat warning systems | 67 |
| D102 | Remove or install anti-skid components | 66 |
| B43 | Inspect AC power components | 66 |
| K187 | Inspect exterior lighting components | 65 |
| K188 | Inspect interior lighting components | 65 |
| B51 | Isolate DC power malfunctions | 65 |
| R359 | Perform leakage checks of air-conditioning systems | 64 |
| P316 | Perform operational checks of bleed air systems | 63 |
| B45 | Inspect DC power components | 63 |
| K183 | Assemble or disassemble exterior lighting assemblies | 63 |
| P323 | Remove or install bleed air system components | 62 |
| R355 | Isolate air-conditioning system malfunctions | 62 |
| P312 | Perform leakage checks of bleed air systems | 62 |
| D84 | Inspect anti-skid components | 62 |
| B58 | Perform operational checks of external power systems | 62 |
| D90 | Isolate anti-skid malfunctions | 62 |
| R352 | Inspect air-conditioning systems | 61 |
| O276 | Perform leakage checks of cabin or cargo pressurization systems | 60 |
| O279 | Perform operational checks of cabin or cargo pressurization systems | 60 |

* Average Number of Tasks Performed - 122

TABLE 13

REPRESENTATIVE TASKS PERFORMED BY RESERVE DAFSC 2A636 PERSONNEL

| TASKS | | PERCENT MEMBERS PERFORMING (N=15) |
|---|---|---|
| A17 | Crimp splices or terminals to wires | 93 |
| B54 | Perform operational checks of AC power systems | 87 |
| B49 | Isolate AC power malfunctions | 87 |
| K183 | Assemble or disassemble exterior lighting assemblies | 87 |
| A16 | Clean test equipment | 87 |
| A26 | Inspect wire bundles or harnesses | 87 |
| R362 | Perform operational checks of air-conditioning systems | 87 |
| K193 | Perform operational checks of exterior lighting | 87 |
| P323 | Remove or install bleed air system components | 87 |
| K189 | Isolate exterior lighting malfunctions | 87 |
| A11 | Clean connector plugs | 87 |
| B56 | Perform operational checks of DC power systems | 80 |
| B59 | Remove or install AC power components | 80 |
| H156 | Clean batteries | 80 |
| A4 | Assemble or disassemble connector plugs | 80 |
| B61 | Remove or install DC power components | 80 |
| B51 | Isolate DC power malfunctions | 80 |
| K184 | Assemble or disassemble interior lighting assemblies | 80 |
| K196 | Remove or install interior lighting components | 80 |
| R352 | Inspect air-conditioning systems | 80 |
| K194 | Perform operational checks of interior lighting | 80 |
| K195 | Remove or install exterior lighting components | 80 |
| A29 | Perform corrosion control | 80 |
| P297 | Inspect bleed air systems | 80 |
| N257 | Purge aircraft LOX converters | 80 |
| P304 | Isolate bleed air system malfunctions | 80 |
| B43 | Inspect AC power components | 80 |
| K187 | Inspect exterior lighting components | 80 |
| B45 | Inspect DC power components | 80 |
| J176 | Inspect fire and overheat detection circuit components | 80 |
| B41 | Bench check DC power components | 73 |
| H163 | Perform capacitance tests and service batteries | 73 |
| R366 | Remove or install air-conditioning system components | 73 |
| A24 | Inspect electrical bonds or grounds | 73 |
| K185 | Bench check exterior lighting components | 73 |
| R359 | Perform leakage checks of air-conditioning systems | 73 |
| R355 | Isolate air-conditioning system malfunctions | 73 |
| I171 | Remove or install fire or overheat system components | 73 |
| O279 | Perform operational checks of cabin or cargo pressurization systems | 73 |

* Average Number of Tasks Performed - 162

TABLE 14

REPRESENTATIVE TASKS PERFORMED BY ALL DAFSC 2A656 PERSONNEL

| TASKS | | PERCENT MEMBERS PERFORMING (N=978) |
|---|---|---|
| A17 | Crimp splices or terminals to wires | 90 |
| A4 | Assemble or disassemble connector plugs | 86 |
| A11 | Clean connector plugs | 83 |
| K193 | Perform operational checks of exterior lighting | 82 |
| A26 | Inspect wire bundles or harnesses | 81 |
| K194 | Perform operational checks of interior lighting | 80 |
| B54 | Perform operational checks of AC power systems | 78 |
| B56 | Perform operational checks of DC power systems | 77 |
| K195 | Remove or install exterior lighting components | 76 |
| B59 | Remove or install AC power components | 76 |
| K196 | Remove or install interior lighting components | 76 |
| K187 | Inspect exterior lighting components | 76 |
| K189 | Isolate exterior lighting malfunctions | 76 |
| B43 | Inspect AC power components | 75 |
| J178 | Perform operational checks of fire and overheat warning systems | 75 |
| D84 | Inspect anti-skid components | 75 |
| R362 | Perform operational checks of air-conditioning systems | 74 |
| D96 | Perform operational checks of anti-skid systems | 74 |
| K188 | Inspect interior lighting components | 74 |
| K190 | Isolate interior lighting malfunctions | 74 |
| B61 | Remove or install DC power components | 74 |
| A24 | Inspect electrical bonds or grounds | 73 |
| R366 | Remove or install air-conditioning system components | 72 |
| A32 | Perform time compliance technical orders (TCTOs) modifications | 72 |
| R352 | Inspect air-conditioning systems | 72 |
| B49 | Isolate AC power malfunctions | 72 |
| B45 | Inspect DC power components | 72 |
| R359 | Perform leakage checks of air-conditioning systems | 71 |
| D102 | Remove or install anti-skid components | 70 |
| D90 | Isolate anti-skid malfunctions | 70 |
| J176 | Inspect fire and overheat detection circuit components | 70 |
| B51 | Isolate DC power malfunctions | 70 |
| J177 | Isolate fire and overheat detection circuit malfunctions | 70 |
| R355 | Isolate air-conditioning system malfunctions | 69 |
| K183 | Assemble or disassemble exterior lighting assemblies | 68 |
| B58 | Perform operational checks of external power systems | 68 |
| I171 | Remove or install fire or overheat system components | 68 |
| P323 | Remove or install bleed air system components | 67 |
| P297 | Inspect bleed air systems | 67 |

*Average Number of Tasks Performed - 162

TABLE 15

REPRESENTATIVE TASKS PERFORMED BY ACTIVE DUTY 2A656 PERSONNEL

| TASKS | | PERCENT MEMBERS PERFORMING (N=578) |
|---|---|---|
| A17 | Crimp splices or terminals to wires | 87 |
| A4 | Assemble or disassemble connector plugs | 82 |
| A11 | Clean connector plugs | 81 |
| A26 | Inspect wire bundles or harnesses | 77 |
| K193 | Perform operational checks of exterior lighting | 77 |
| K194 | Perform operational checks of interior lighting | 75 |
| B54 | Perform operational checks of AC power systems | 73 |
| B56 | Perform operational checks of DC power systems | 73 |
| B43 | Inspect AC power components | 71 |
| K189 | Isolate exterior lighting malfunctions | 71 |
| K187 | Inspect exterior lighting components | 71 |
| A32 | Perform time compliance technical orders (TCTOs) modifications | 70 |
| B59 | Remove or install AC power components | 70 |
| B49 | Isolate AC power malfunctions | 70 |
| K195 | Remove or install exterior lighting components | 70 |
| J178 | Perform operational checks of fire and overheat warning systems | 70 |
| K196 | Remove or install interior lighting components | 70 |
| K190 | Isolate interior lighting malfunctions | 70 |
| K188 | Inspect interior lighting components | 69 |
| B61 | Remove or install DC power components | 69 |
| B45 | Inspect DC power components | 68 |
| B51 | Isolate DC power malfunctions | 68 |
| R362 | Perform operational checks of air-conditioning systems | 67 |
| A24 | Inspect electrical bonds or grounds | 67 |
| B58 | Perform operational checks of external power systems | 67 |
| D84 | Inspect anti-skid components | 67 |
| J177 | Isolate fire and overheat detection circuit malfunctions | 67 |
| R366 | Remove or install air-conditioning system components | 66 |
| R352 | Inspect air-conditioning systems | 66 |
| D96 | Perform operational checks of anti-skid systems | 66 |
| B53 | Isolate external power system malfunctions | 66 |
| P323 | Remove or install bleed air system components | 65 |
| R355 | Isolate air-conditioning system malfunctions | 65 |
| R359 | Perform leakage checks of air-conditioning systems | 65 |
| P304 | Isolate bleed air system malfunctions | 64 |
| D102 | Remove or install anti-skid components | 64 |
| D90 | Isolate anti-skid malfunctions | 64 |
| J176 | Inspect fire and overheat detection circuit components | 64 |
| D99 | Perform operational checks of landing gear control or warning systems | 64 |

* Average Number of Tasks Performed - 151

TABLE 16

REPRESENTATIVE TASKS PERFORMED BY GUARD DAFSC 2A656 PERSONNEL

| TASKS | | PERCENT MEMBERS PERFORMING (N=225) |
|---|---|---|
| A17 | Crimp splices or terminals to wires | 92 |
| A4 | Assemble or disassemble connector plugs | 89 |
| A11 | Clean connector plugs | 89 |
| A26 | Inspect wire bundles or harnesses | 88 |
| D96 | Perform operational checks of anti-skid systems | 88 |
| K193 | Perform operational checks of exterior lighting | 88 |
| K195 | Remove or install exterior lighting components | 88 |
| B54 | Perform operational checks of AC power systems | 87 |
| K194 | Perform operational checks of interior lighting | 87 |
| K183 | Assemble or disassemble exterior lighting assemblies | 87 |
| B56 | Perform operational checks of DC power systems | 86 |
| H157 | Inspect batteries | 85 |
| D84 | Inspect anti-skid components | 85 |
| K196 | Remove or install interior lighting components | 85 |
| B59 | Remove or install AC power components | 84 |
| R352 | Inspect air-conditioning systems | 83 |
| K189 | Isolate exterior lighting malfunctions | 83 |
| K184 | Assemble or disassemble interior lighting assemblies | 83 |
| A24 | Inspect electrical bonds or grounds | 82 |
| R362 | Perform operational checks of air-conditioning systems | 82 |
| K187 | Inspect exterior lighting components | 82 |
| K188 | Inspect interior lighting components | 81 |
| B61 | Remove or install DC power components | 81 |
| K190 | Isolate interior lighting malfunctions | 81 |
| H156 | Clean batteries | 80 |
| R366 | Remove or install air-conditioning system components | 80 |
| J178 | Perform operational checks of fire and overheat warning systems | 80 |
| D90 | Isolate anti-skid malfunctions | 80 |
| B43 | Inspect AC power components | 79 |
| R359 | Perform leakage checks of air-conditioning systems | 78 |
| A32 | Perform time compliance technical orders (TCTOs) modifications | 78 |
| D102 | Remove or install anti-skid components | 78 |
| J176 | Inspect fire and overheat detection circuit components | 78 |
| O276 | Perform leakage checks of cabin or cargo pressurization systems | 76 |
| B49 | Isolate AC power malfunctions | 76 |
| B45 | Inspect DC power components | 76 |
| P297 | Inspect bleed air systems | 75 |
| B51 | Isolate DC power malfunctions | 75 |
| H163 | Perform capacitance tests and service batteries | 74 |

* Average Number of Tasks Performed - 173

TABLE 17

REPRESENTATIVE TASKS PERFORMED BY RESERVE DAFSC 2A656 PERSONNEL

| TASKS | | PERCENT MEMBERS PERFORMING (N=175) |
|---|---|---|
| A17 | Crimp splices or terminals to wires | 95 |
| A4 | Assemble or disassemble connector plugs | 93 |
| K193 | Perform operational checks of exterior lighting | 89 |
| K194 | Perform operational checks of interior lighting | 87 |
| A26 | Inspect wire bundles or harnesses | 85 |
| D84 | Inspect anti-skid components | 85 |
| K196 | Remove or install interior lighting components | 84 |
| K187 | Inspect exterior lighting components | 84 |
| K195 | Remove or install exterior lighting components | 84 |
| B54 | Perform operational checks of AC power systems | 83 |
| K189 | Isolate exterior lighting malfunctions | 83 |
| D96 | Perform operational checks of anti-skid systems | 83 |
| J178 | Perform operational checks of fire and overheat warning systems | 83 |
| A11 | Clean connector plugs | 82 |
| R362 | Perform operational checks of air-conditioning systems | 82 |
| B59 | Remove or install AC power components | 82 |
| R366 | Remove or install air-conditioning system components | 82 |
| D102 | Remove or install anti-skid components | 82 |
| B43 | Inspect AC power components | 81 |
| K188 | Inspect interior lighting components | 81 |
| B61 | Remove or install DC power components | 81 |
| B56 | Perform operational checks of DC power systems | 80 |
| A24 | Inspect electrical bonds or grounds | 79 |
| K190 | Isolate interior lighting malfunctions | 79 |
| R359 | Perform leakage checks of air-conditioning systems | 79 |
| J176 | Inspect fire and overheat detection circuit components | 79 |
| K183 | Assemble or disassemble exterior lighting assemblies | 78 |
| R352 | Inspect air-conditioning systems | 78 |
| D90 | Isolate anti-skid malfunctions | 78 |
| K184 | Assemble or disassemble interior lighting assemblies | 77 |
| B45 | Inspect DC power components | 77 |
| R355 | Isolate air-conditioning system malfunctions | 77 |
| I170 | Perform operational checks of master caution warning systems | 77 |
| I171 | Remove or install fire or overheat system components | 77 |
| B49 | Isolate AC power malfunctions | 76 |
| J177 | Isolate fire and overheat detection circuit malfunctions | 76 |
| B58 | Perform operational checks of external power systems | 74 |
| I167 | Inspect master caution warning system components | 74 |
| B51 | Isolate DC power malfunctions | 74 |

* Average Number of Tasks Performed - 184

TABLE 18

TASKS WHICH BEST DIFFERENTIATE BETWEEN ALL DAFSC 2A636 AND DAFSC 2A656 PERSONNEL
(PERCENT MEMBERS PERFORMING)

| TASKS | | DAFSC 2A636 (N=356) | DAFSC 3A656 (N=978) | DIFF |
|---|---|---|---|---|
| V555 | Conduct OJT | 15 | 49 | -35 |
| U543 | Supervise military personnel | 3 | 37 | -34 |
| Y621 | Clear Red-X conditions | 2 | 34 | -32 |
| U485 | Counsel subordinates concerning personal matters | 1 | 31 | -30 |
| U488 | Determine or establish work assignments or priorities | 5 | 34 | -29 |
| V558 | Demonstrate how to locate technical information | 13 | 42 | -29 |
| V559 | Demonstrate operation of equipment | 17 | 43 | -26 |
| U483 | Conduct supervisory performance feedback sessions | 1 | 27 | -26 |
| V568 | Evaluate progress of trainees | 3 | 28 | -25 |
| U475 | Assign personnel to work areas or duty positions | 3 | 28 | -25 |
| V573 | Maintain training records or files | 10 | 34 | -24 |
| Y622 | Coordinate aircraft maintenance activities with maintenance control | 6 | 29 | -23 |
| U518 | Evaluate personnel for compliance with performance standards | 1 | 23 | -22 |
| V567 | Evaluate personnel to determine training needs | 2 | 24 | -22 |
| U528 | Inspect personnel for compliance with military standards | 3 | 24 | -21 |
| U480 | Conduct self-inspections or self-assessments | 7 | 28 | -21 |
| U479 | Conduct safety inspections of equipment or facilities | 9 | 29 | -20 |
| U546 | Write performance reports or supervisory appraisals | .56 | 20 | -20 |
| U482 | Conduct supervisory orientations for newly assigned personnel | .56 | 20 | -20 |
| U506 | Establish performance standards for subordinates | .12 | 20 | -19 |

TABLE 19

TASKS WHICH BEST DIFFERENTIATE BETWEEN ACTIVE DUTY DAFSC 2A636 AND DAFSC 2A656 PERSONNEL
(PERCENT MEMBERS PERFORMING)

| TASKS | | DAFSC 2A636 (N=341) | DAFSC 2A656 (N=578) | DIFF |
|---|---|---|---|---|
| U485 | Counsel subordinates concerning personal matters | 1 | 45 | -44 |
| U543 | Supervise military personnel | 3 | 46 | -43 |
| U483 | Conduct supervisory performance feedback sessions | 1 | 41 | -40 |
| V555 | Conduct OJT | 14 | 54 | -40 |
| U488 | Determine or establish work assignments or priorities | 5 | 43 | -38 |
| Y621 | Clear Red-X conditions | 2 | 39 | -37 |
| U546 | Write performance reports or supervisory appraisals | 1 | 33 | -32 |
| V558 | Demonstrate how to locate technical information | 13 | 45 | -32 |
| V559 | Demonstrate operation of equipment | 16 | 48 | -32 |
| U475 | Assign personnel to work areas or duty positions | 3 | 34 | -31 |
| U518 | Evaluate personnel for compliance with military standards | 2 | 33 | -31 |
| V568 | Evaluate progress of trainees | 3 | 34 | -31 |
| U528 | Inspect personnel for compliance with military standards | 3 | 33 | -30 |
| V573 | Maintain training records or files | 10 | 40 | -30 |
| U506 | Establish performance standards for subordinates | 1 | 30 | -29 |
| U482 | Conduct supervisory orientations for newly assigned personnel | 1 | 28 | -27 |
| V567 | Evaluate personnel to determine training needs | 1 | 28 | -27 |
| U479 | Conduct safety inspections of equipment or facilities | 9 | 32 | -23 |
| U480 | Conduct self-inspection or self-assessments | 7 | 30 | -23 |
| U519 | Evaluate personnel for promotion, demotion, reclassification, or special awards | 1 | 22 | -21 |
| U491 | Develop or establish work methods or procedures | 5 | 26 | -21 |

TABLE 20

TASKS WHICH BEST DIFFERENTIATE BETWEEN RESERVE 2A636 AND RESERVE 2A656 PERSONNEL
(PERCENT MEMBERS PERFORMING)

| TASKS | | RESERVE 2A636 (N=15) | RESERVE 2A656 (N=175) | DIFF |
|---|---|---|---|---|
| A16 | Clean test equipment | 87 | 44 | 43 |
| B41 | Bench check DC power components | 73 | 35 | 38 |
| N259 | Purge LOX servicing carts | 67 | 32 | 35 |
| A9 | Bench check motors | 73 | 39 | 34 |
| A35 | Service test equipment | 66 | 33 | 33 |
| N238 | Isolate LOX servicing cart malfunctions | 66 | 33 | 33 |
| A31 | Perform soldering on circuit boards | 73 | 41 | 32 |
| N235 | Inspect oxygen walkaround bottles or regulators | 66 | 34 | 32 |
| N262 | Remove or install LOX servicing cart components | 67 | 35 | 32 |
| H156 | Clean batteries | 80 | 49 | 31 |
| B40 | Bench check AC power components | 66 | 36 | 30 |
| N267 | Remove or install oxygen walkaround bottles or regulators | 60 | 30 | 30 |
| P301 | Inspect ram air systems | 7 | 44 | -37 |
| G149 | Perform operational checks of spoiler control systems | 7 | 43 | -36 |
| T441 | Position or remove aircraft chocks | 20 | 55 | -35 |
| Y621 | Clear Red-X conditions | 0 | 34 | -34 |
| T472 | Walk wings or tails during aircraft towing operations | 27 | 59 | -32 |
| C75 | Perform operational checks of electrical or air-operated starter system components | 13 | 43 | -30 |
| R354 | Inspect equipment cooling systems, | 27 | 57 | -30 |
| R368 | Remove or install equipment cooling system components | 27 | 57 | -30 |
| G153 | Remove or install spoiler control components | 7 | 37 | -30 |
| R357 | Isolate equipment cooling system malfunctions | 27 | 57 | -30 |
| G141 | Inspect spoiler control components | 7 | 37 | -30 |

6 percent of the AFRES reporting grouped into the Supervisor Cluster. Since the ANG and AFRES members spend very little time performing Supervisory duties, this is the most significant area of difference between components. Tables 21-24 list the most common tasks performed by 7-skill level personnel. While active duty tasks involve supervisory functions, ANG and AFRES members still perform many of the technical tasks. Tables 25-28 show those tasks which best differentiate the 5-and 7-skill levels. As expected, key differences at the 7-skill level are greater emphasis on supervision and administration, with less emphasis on technical tasks.

### Summary

Active duty Aircraft Electrical and Environmental Systems career ladder progression follows a normal pattern of technical job focus at the 3-skill level. Personnel slowly progress into supervisory duties in the 5-skill level, but are still performing mostly technical tasks, while at the 7-skill level they are primarily concerned with supervising personnel. On the other hand, ANG and AFRES personnel tend to perform a larger number of technical tasks at the upper skill levels, possibly due to the limited number of personnel in these components. Across all three components, emphasis at the 3-skill level is on fundamental maintenance and power systems. At the 5-skill level, members are still primarily concerned with fundamental maintenance and power systems, with a small increase in the supervisory duties within the active duty members. At the 7-skill level, active duty members spend most of their time performing supervisory activities, while ANG and AFRES work is still largely focused on technical tasks.

## TRAINING ANALYSIS

Occupational survey data represent one of many sources of information which are used to assist in the development of training programs for career ladder personnel. OSR data useful to training personnel include job descriptions for the various jobs performed within a career ladder, distribution of personnel across career ladder jobs, percentages of personnel performing specific tasks, and percentages of personnel maintaining specific equipment or systems, as well as the difficulty of tasks and TE ratings gathered from senior members of the career ladder.

### First Enlistment Analysis

In this study, there are 362 Aircraft Electrical and Environmental Systems members in their first enlistment (1-48 months TAFMS), representing 20 percent of the survey sample. Jobs they perform are displayed in Figure 2. As displayed in Table 29, 12 percent of their time is spent maintaining aircraft power and distribution systems, 11 percent of their time is spent performing fundamental maintenance, and 11 percent of their time is spent maintaining aircraft oxygen systems. Figure 2 shows that 75 percent of first-enlistment personnel are working on the

TABLE 21

REPRESENTATIVE TASKS PERFORMED BY ALL DAFSC 2A676 PERSONNEL

| TASKS | | PERCENT MEMBERS PERFORMING (N=489) |
|---|---|---|
| A17 | Crimp splices or terminals to wires | 70 |
| A26 | Inspect wire bundles or harnesses | 70 |
| A4 | Assemble or disassemble connector plugs | 68 |
| U543 | Supervise military personnel | 67 |
| Y621 | Clear Red-X conditions | 67 |
| B43 | Inspect AC power components | 67 |
| D84 | Inspect anti-skid components | 67 |
| K193 | Perform operational checks of exterior lighting | 67 |
| Y618 | Access core automated maintenance system (CAMS) menus and data screens | 66 |
| B54 | Perform operational checks of AC power systems | 66 |
| B45 | Inspect DC power components | 66 |
| K194 | Perform operational checks of interior lighting | 66 |
| J178 | Perform operational checks of fire and overheat warning systems | 66 |
| B56 | Perform operational checks of DC power systems | 65 |
| D96 | Perform operational checks of anti-skid systems | 65 |
| A11 | Clean connector plugs | 65 |
| B59 | Remove or install AC power components | 65 |
| K188 | Inspect interior lighting components | 65 |
| A32 | Perform time compliance technical orders (TCTOs) modifications | 64 |
| K195 | Remove or install exterior lighting components | 64 |
| B49 | Isolate AC power malfunctions | 63 |
| A24 | Inspect electrical bonds or grounds | 63 |
| D90 | Isolate anti-skid malfunctions | 63 |
| U488 | Determine or establish work assignments or priorities | 62 |
| V555 | Conduct OJT | 62 |
| R366 | Remove or install air-conditioning system components | 62 |
| R352 | Inspect air-conditioning systems | 62 |
| R355 | Isolate air-conditioning system malfunctions | 62 |
| R362 | Perform operational checks of air-conditioning systems | 62 |
| P297 | Inspect bleed air systems | 62 |
| U475 | Assign personnel to work areas or duty positions | 58 |
| U480 | Conduct self-inspections or self-assessments | 57 |
| Y637 | Initiate or annotate aircraft flight or maintenance records, such as AFTO Forms 781 series | 57 |
| V573 | Maintain training records or files | 56 |
| V558 | Demonstrate how to locate technical information | 56 |
| U518 | Evaluate personnel for compliance with performance standards | 55 |
| U485 | Counsel subordinates concerning personal matters | 55 |
| A25 | Inspect test equipment | 54 |

* Average Number of Tasks Performed - 174

TABLE 22

REPRESENTATIVE TASKS PERFORMED BY ACTIVE DUTY 2A676 PERSONNEL

| TASKS | | PERCENT MEMBERS PERFORMING (N=242) |
|---|---|---|
| U543 | Supervise military personnel | 77 |
| U485 | Counsel subordinates concerning personal matters | 71 |
| U488 | Determine or establish work assignments or priorities | 70 |
| U546 | Write performance reports or supervisory appraisals | 70 |
| U483 | Conduct supervisory performance feedback sessions | 70 |
| Y621 | Clear Red-X conditions | 68 |
| U518 | Evaluate personnel for compliance with performance standards | 68 |
| U475 | Assign personnel to work areas or duty positions | 64 |
| U528 | Inspect personnel for compliance with military standards | 62 |
| Y618 | Access core automated maintenance system (CAMS) menus and data screens | 61 |
| U532 | Participate in general meetings, such as staff meetings, briefings, conferences, or workshops, other than conducting | 60 |
| U480 | Conduct self-inspections or self-assessments | 60 |
| U491 | Develop or establish work methods or procedures | 60 |
| V573 | Maintain training records or files | 59 |
| U492 | Develop or establish work schedules | 58 |
| U482 | Conduct supervisory orientations for newly assigned personnel | 57 |
| U478 | Conduct general meetings, such as staff meetings, briefings, conferences, or workshops | 55 |
| U537 | Plan or schedule work assignments or priorities | 55 |
| U479 | Conduct safety inspections of equipment or facilities | 55 |
| U506 | Establish performance standards for subordinates | 55 |
| V568 | Evaluate progress of trainees | 54 |
| V555 | Conduct OJT | 53 |
| U486 | Determine or establish logistics requirements, such as personnel, equipment, tools, parts, supplies, or workspace | 52 |
| U540 | Schedule personnel for temporary duty (TDY) assignments, leaves, or passes | 52 |
| U522 | Evaluate work schedules | 51 |
| U519 | Evaluate personnel for promotion, demotion, reclassification, or special awards | 51 |
| V567 | Evaluate personnel to determine training needs | 51 |
| Y645 | Review aircraft flight or maintenance records, such as AFTO Forms 781 series | 50 |
| Y637 | Initiate or annotate aircraft flight or maintenance records, such as AFTO Forms 781 series | 50 |
| U529 | Interpret policies, directives, or procedures for subordinates | 48 |
| U523 | Evaluate workload requirements | 47 |
| V560 | Determine training requirements | 46 |
| Y641 | Observe in-process maintenance or initiate on-the-spot corrections | 45 |
| V575 | Plan or schedule training | 44 |
| Y644 | Retrieve CAMS listings or reports | 43 |

* Average Number of Tasks Performed - 129

TABLE 23

REPRESENTATIVE TASKS PERFORMED BY GUARD DAFSC 2A676 PERSONNEL

| TASKS | | PERCENT MEMBERS PERFORMING (N=137) |
|---|---|---|
| A17 | Crimp splices or terminals to wires | 94 |
| D96 | Perform operational checks of anti-skid systems | 92 |
| A4 | Assemble or disassemble connector plugs | 91 |
| K194 | Perform operational checks of interior lighting | 91 |
| K193 | Perform operational checks of exterior lighting | 91 |
| K195 | Remove or install exterior lighting components | 91 |
| K196 | Remove or install interior lighting components | 91 |
| J178 | Perform operational checks of fire and overheat warning systems | 90 |
| K184 | Assemble or disassemble interior lighting assemblies | 90 |
| K183 | Assemble or disassemble exterior lighting assemblies | 89 |
| A26 | Inspect wire bundles or harnesses | 88 |
| A11 | Clean connector plugs | 88 |
| B59 | Remove or install AC power components | 88 |
| D84 | Inspect anti-skid components | 88 |
| K189 | Isolate exterior lighting malfunctions | 88 |
| D102 | Remove or install anti-skid components | 88 |
| J176 | Inspect fire and overheat detection circuit components | 88 |
| K190 | Isolate interior lighting malfunctions | 88 |
| B54 | Perform operational checks of AC power systems | 87 |
| A32 | Perform time compliance technical orders (TCTOs) modifications | 87 |
| A24 | Inspect electrical bonds or grounds | 87 |
| R352 | Inspect air-conditioning systems | 87 |
| R362 | Perform operational checks of air-conditioning systems | 87 |
| O279 | Perform operational checks of cabin or cargo pressurization systems | 87 |
| B61 | Remove or install DC power components | 87 |
| O276 | Perform leakage checks of cabin or cargo pressurization systems | 86 |
| B56 | Perform operational checks of DC power systems | 85 |
| R366 | Remove or install air-conditioning system components | 85 |
| R355 | Isolate air-conditioning system malfunctions | 85 |
| P297 | Inspect bleed air systems | 85 |
| D90 | Isolate anti-skid malfunctions | 85 |
| B43 | Inspect AC power components | 85 |
| K188 | Inspect interior lighting components | 85 |
| B45 | Inspect DC power components | 84 |
| O282 | Remove or install cabin or cargo pressurization system components | 84 |
| Y618 | Access core automated maintenance system (CAMS) menus and data screens | 82 |
| H157 | Inspect batteries | 82 |
| P323 | Remove or install bleed air system components | 82 |
| O273 | Isolate cabin or cargo pressurization system malfunctions | 82 |
| B49 | Isolate AC power malfunctions | 81 |
| R359 | Perform leakage checks of air-conditioning systems | 81 |

* Average Number of Tasks Performed - 225

TABLE 24

REPRESENTATIVE TASKS PERFORMED BY RESERVE DAFSC 2A676 PERSONNEL

| TASKS | | PERCENT MEMBERS PERFORMING (N=110) |
|---|---|---|
| B54 | Perform operational checks of AC power systems | 90 |
| D84 | Inspect anti-skid components | 89 |
| B56 | Perform operational checks of DC power systems | 88 |
| K193 | Perform operational checks of exterior lighting | 88 |
| A26 | Inspect wire bundles or harnesses | 87 |
| B59 | Remove or install AC power components | 87 |
| B43 | Inspect AC power components | 86 |
| J178 | Perform operational checks of fire and overheat warning systems | 86 |
| B61 | Remove or install DC power components | 86 |
| A17 | Crimp splices or terminals to wires | 85 |
| D96 | Perform operational checks of anti-skid systems | 85 |
| A11 | Clean connector plugs | 85 |
| B49 | Isolate AC power malfunctions | 85 |
| K196 | Remove or install interior lighting components | 85 |
| K194 | Perform operational checks of interior lighting | 85 |
| K188 | Inspect interior lighting components | 85 |
| B45 | Inspect DC power components | 85 |
| K187 | Inspect exterior lighting components | 85 |
| B51 | Isolate DC power malfunctions | 85 |
| K195 | Remove or install exterior lighting components | 84 |
| D102 | Remove or install anti-skid components | 84 |
| I171 | Remove or install fire or overheat system components | 84 |
| K189 | Isolate exterior lighting malfunctions | 84 |
| K183 | Assemble or disassemble exterior lighting assemblies | 84 |
| K184 | Assemble or disassemble interior lighting assemblies | 84 |
| A4 | Assemble or disassemble connector plugs | 83 |
| B58 | Perform operational checks of external power systems | 83 |
| D90 | Isolate anti-skid malfunctions | 82 |
| R355 | Isolate air-conditioning system malfunctions | 81 |
| R362 | Perform operational checks of air-conditioning systems | 81 |
| K190 | Isolate interior lighting malfunctions | 81 |
| A24 | Inspect electrical bonds or grounds | 80 |
| R352 | Inspect air-conditioning systems | 80 |
| J176 | Inspect fire and overheat detection circuit components | 80 |
| J177 | Isolate fire and overheat detection circuit malfunctions | 80 |
| R366 | Remove or install air-conditioning system components | 79 |
| R359 | Perform leakage checks of air-conditioning systems | 79 |
| O282 | Remove or install cabin or cargo pressurization system components | 79 |
| I173 | Remove or install warning system components | 78 |

* Average Number of Tasks Performed - 208

TABLE 25

TASKS WHICH BEST DIFFERENTIATE BETWEEN ALL DAFSC 2A656 AND DAFSC 2A676 PERSONNEL
(PERCENT MEMBERS PERFORMING)

| TASKS | | DAFSC 2A656 (N=978) | DAFSC 2A676 (N=489) | DIFF |
|---|---|---|---|---|
| A17 | Crimp splices or terminals to wires | 90 | 70 | 20 |
| A4 | Assemble or disassemble connector plugs | 86 | 68 | 18 |
| A11 | Clean connector plugs | 83 | 65 | 18 |
| --- | --- | --- | --- | --- |
| U492 | Develop or establish work schedules | 15 | 49 | -34 |
| Y621 | Clear Red-X conditions | 34 | 67 | -33 |
| U518 | Evaluate personnel for compliance with performance standards | 23 | 55 | -32 |
| U540 | Schedule personnel for temporary duty (TDY) assignment, leaves, or passes | 6 | 37 | -31 |
| U537 | Plan or schedule work assignments or priorities | 16 | 47 | -31 |
| U543 | Supervise military personnel | 37 | 67 | -30 |
| U475 | Assign personnel to work areas or duty positions | 28 | 58 | -30 |
| U491 | Develop or establish work methods or procedures | 22 | 52 | -30 |
| U575 | Plan or schedule training | 17 | 46 | -29 |
| U522 | Evaluate work schedules | 10 | 39 | -29 |
| U488 | Determine or establish work assignments or priorities | 33 | 62 | -29 |
| U480 | Conduct self-inspections or self-assessments | 28 | 57 | -29 |
| V579 | Schedule personnel for training | 13 | 42 | -29 |
| U486 | Determine or establish logistics requirements, such as personnel, equipment, tools, parts, supplies, or workspace | 17 | 45 | -28 |
| U532 | Participate in general meetings, such as staff meetings, briefings, conferences, or workshops, other than conducting | 22 | 50 | -28 |
| U523 | Evaluate workload requirements | 9 | 37 | -28 |
| V560 | Determine training requirements | 16 | 43 | -27 |
| U476 | Assign sponsors for newly assigned personnel | 6 | 33 | -27 |
| U478 | Conduct general meetings, such as staff meetings, briefings, conferences, or workshops | 13 | 40 | -27 |
| U519 | Evaluate personnel for promotion, demotion, reclassification, or special awards | 16 | 42 | -26 |

TABLE 26

TASKS WHICH BEST DIFFERENTIATE BETWEEN ACTIVE DUTY DAFSC 2A656 AND DAFSC 2A676 PERSONNEL
(PERCENT MEMBERS PERFORMING)

| TASKS | | DAFSC 2A656 (N=578) | DAFSC 2A676 (N=242) | DIFF |
|---|---|---|---|---|
| A17 | Crimp splices or terminals to wires | 87 | 49 | 38 |
| A11 | Clean connector plugs | 81 | 44 | 37 |
| A4 | Assemble or disassemble connector plugs | 82 | 48 | 34 |
| K193 | Perform operational checks of exterior lighting | 77 | 43 | 34 |
| T441 | Position or remove aircraft chocks | 59 | 27 | 32 |
| K194 | Perform operational checks of interior lighting | 75 | 44 | 31 |
| B56 | Perform operational checks of DC power systems | 73 | 43 | 30 |
| K195 | Remove or install exterior lighting components | 70 | 40 | 30 |
| K196 | Remove or install interior lighting components | 70 | 40 | 30 |
| K190 | Isolate interior lighting malfunctions | 70 | 40 | 30 |
| R362 | Perform operational checks of air-conditioning systems | 67 | 38 | 29 |
| B54 | Perform operational checks of AC power systems | 73 | 44 | 29 |
| U540 | Schedule personnel for temporary duty (TDY) assignments, leaves, or passes | 9 | 52 | -43 |
| U492 | Develop or establish work schedules | 19 | 58 | -39 |
| U478 | Conduct general meetings, such as staff meetings, briefings, conferences, or workshops | 16 | 55 | -39 |
| U522 | Evaluate work schedules | 13 | 50 | -37 |
| U546 | Write performance reports or supervisory appraisals | 33 | 70 | -37 |
| U518 | Evaluate personnel for compliance with performance standards | 32 | 68 | -36 |
| U523 | Evaluate workload requirements | 11 | 46 | -35 |
| U532 | Participate in general meetings, such as staff meetings, briefings, conferences, or workshops, other than conducting | 25 | 60 | -35 |
| U476 | Assign sponsors for newly assigned personnel | 8 | 42 | -34 |
| U537 | Plan or schedule work assignments or priorities | 20 | 54 | -34 |

TABLE 27

TASKS WHICH BEST DIFFERENTIATE BETWEEN GUARD DAFSC 2A656 AND DAFSC 2A676 PERSONNEL
(PERCENT MEMBERS PERFORMING)

| TASKS | | DAFSC 2A656 (N=225) | DAFSC 2A676 (N=137) | DIFF |
|---|---|---|---|---|
| Y621 | Clear Red-X conditions | 23 | 75 | -52 |
| U543 | Supervise military personnel | 17 | 59 | -42 |
| V555 | Conduct OJT | 33 | 75 | -42 |
| U488 | Determine or establish work assignments or priorities | 16 | 58 | -42 |
| X609 | Initiate requisitions for equipment, tools, parts, or supplies | 22 | 63 | -41 |
| X607 | Evaluate serviceability of equipment, tools, parts, or supplies | 25 | 63 | -38 |
| Y622 | Coordinate aircraft maintenance activities with maintenance control | 40 | 78 | -38 |
| X615 | Maintain precision measurement equipment (PME) calibration schedules | 15 | 53 | -38 |
| X608 | Initiate documentation to turn in excess surplus property | 10 | 47 | -37 |
| V575 | Plan or schedule training | 10 | 46 | -36 |
| U518 | Evaluate personnel for compliance with performance standards | 6 | 42 | -36 |
| U475 | Assign personnel to work areas or duty positions | 13 | 49 | -36 |
| V567 | Evaluate personnel to determine training needs | 13 | 48 | -35 |
| V559 | Demonstrate operation of equipment | 33 | 68 | -35 |
| X617 | Review supply computer runs, such as D04, D18, or M30 | 7 | 42 | -35 |
| X613 | Maintain documentation on items requiring periodic inspections | 17 | 51 | -34 |
| V568 | Evaluate progress of trainees | 16 | 50 | -34 |
| Y641 | Observe in-process maintenance or initiate on-the-spot corrections | 16 | 50 | -34 |
| X611 | Issue or log turn-ins of equipment, tools, parts, or supplies | 28 | 62 | -34 |
| V573 | Maintain training records or files | 16 | 49 | -33 |
| Y651 | Update maintenance data collection (MDC) data using CAMS | 26 | 59 | -33 |
| X614 | Maintain organizational equipment or supply records, such as custodian authorization/custody receipt listings (CA/CRLs) | 7 | 40 | -33 |
| Y639 | Inspect parts received for serviceability | 39 | 72 | -33 |

TABLE 28

TASKS WHICH BEST DIFFERENTIATE BETWEEN RESERVE DAFSC 2A656 AND DAFSC 2A676 PERSONNEL
(PERCENT MEMBERS PERFORMING)

| | TASKS | DAFSC 2A656 (N=175) | DAFSC 2A676 (N=110) | DIFF |
|---|---|---|---|---|
| U485 | Counsel subordinates concerning personal matters | 14 | 48 | -34 |
| U492 | Develop or establish work schedules | 11 | 41 | -30 |
| U475 | Assign personnel to work areas or duty positions | 27 | 57 | -30 |
| U483 | Conduct supervisory performance feedback sessions | 11 | 41 | -30 |
| U518 | Evaluate personnel for compliance with performance standards | 15 | 42 | -27 |
| U528 | Inspect personnel for compliance with military standards | 15 | 42 | -27 |
| U537 | Plan or schedule work assignments or priorities | 13 | 40 | -27 |
| U575 | Plan or schedule training | 22 | 49 | -27 |
| U579 | Schedule personnel for training | 20 | 47 | -27 |
| U480 | Conduct self-inspections or self-assessments | 29 | 55 | -26 |
| U488 | Determine or establish work assignments or priorities | 26 | 52 | -26 |
| U491 | Develop or establish work methods or procedures | 18 | 43 | -25 |
| U482 | Conduct supervisory orientations for newly assigned personnel | 14 | 39 | -25 |
| V571 | Initiate requests for training | 12 | 37 | -25 |
| V560 | Determine training requirements | 17 | 42 | -25 |
| U543 | Supervise military personnel | 33 | 57 | -24 |
| U546 | Write performance reports or supervisory appraisals | 3 | 27 | -24 |
| U497 | Direct training functions | 20 | 44 | -24 |
| U519 | Evaluate personnel for promotion, demotion, reclassification, or special awards | 9 | 32 | -23 |
| V568 | Evaluate progress of trainees | 26 | 49 | -23 |
| U525 | Initiate actions required due to substandard performance of personnel | 5 | 28 | -23 |
| V567 | Evaluate personnel to determine training needs | 22 | 45 | -23 |
| V573 | Maintain training records or files | 36 | 58 | -22 |
| Y621 | Clear Red-X conditions | 34 | 56 | -22 |

# FIGURE 2

## FIRST-ENLISTMENT PERSONNEL JOBS

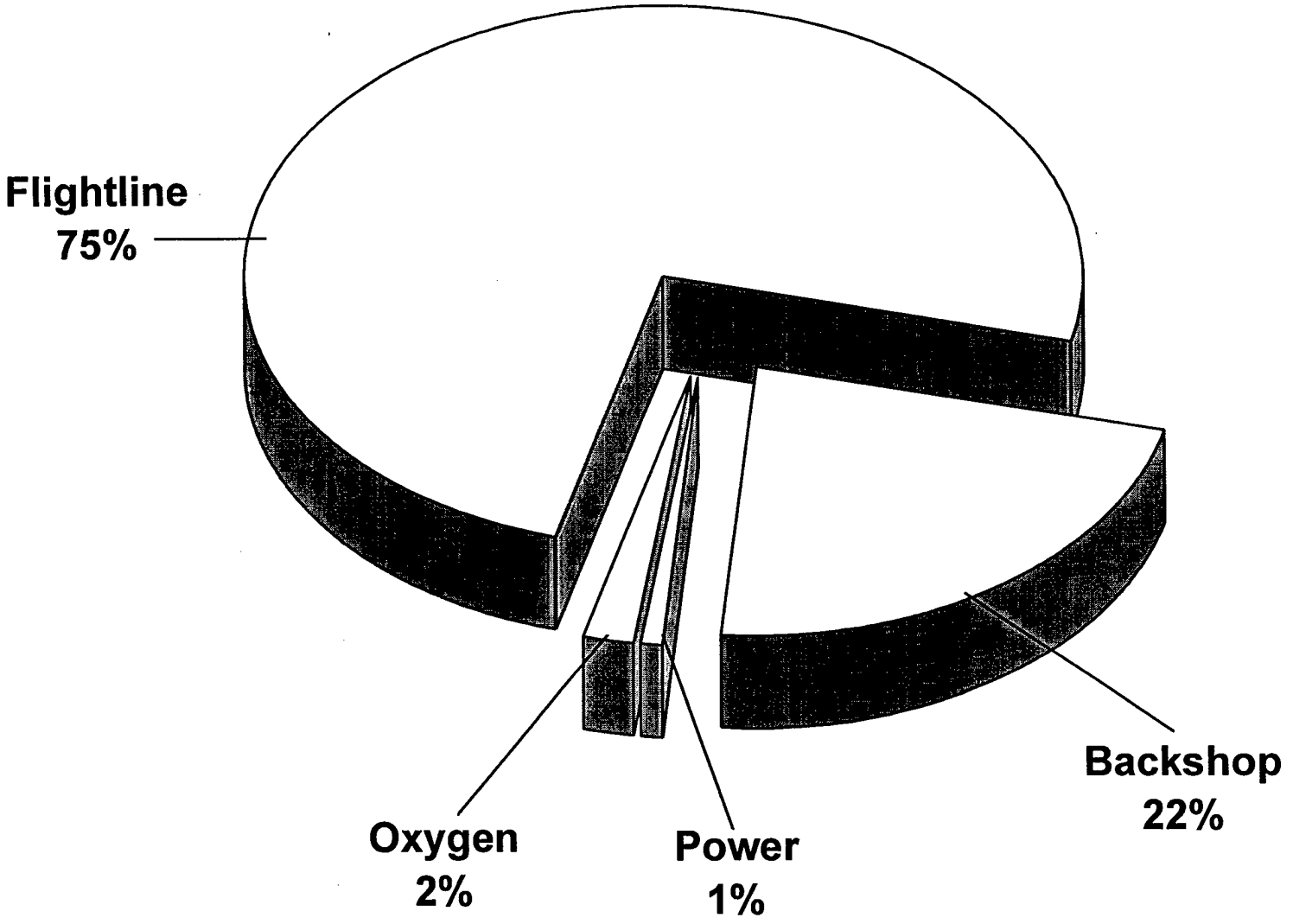


TABLE 29

RELATIVE PERCENT OF TIME SPENT ACROSS DUTIES
BY ACTIVE DUTY FIRST-ENLISTMENT AFSC 2A6X6 PERSONNEL

| | TASKS | AVERAGE PERCENT TIME SPENT (N=362) |
|---|---|---|
| B | Maintaining aircraft power and distribution systems | 12 |
| A | Performing aircraft electrical and environmental fundamental maintenance | 11 |
| N | Maintaining aircraft oxygen systems and associated equipment | 11 |
| T | Performing general aircraft and cross utilization training (CUT) activities | 7 |
| K | Maintaining lighting systems | 7 |
| R | Maintaining aircraft air-conditioning systems | 7 |
| P | Maintaining auxiliary air and bleed air distribution systems | 6 |
| D | Maintaining landing gear systems | 6 |
| Y | Performing maintenance management activities | 5 |
| H | Maintaining batteries | 4 |
| S | Maintaining miscellaneous electrical environmental control systems | 4 |
| O | Maintaining aircraft pressurization systems | 4 |
| I | Maintaining master caution and warning systems | 2 |
| J | Maintaining fire and overheat warning systems | 2 |
| M | Maintaining aircraft fire extinguishing systems | 2 |
| G | Maintaining flight control systems | 2 |
| X | Performing general supply and equipment activities | 2 |
| L | Maintaining anti-icing systems | 1 |
| Q | Maintaining aircraft liquid coolant and liquid cycle refrigeration systems | 1 |
| C | Maintaining engine start and ignition control systems | 1 |
| E | Maintaining cargo door and ramp systems | 1 |
| F | Maintaining fuel and water injection systems | 1 |
| V | Performing training activities | 1 |
| U | Performing management and supervisory activities | 1 |
| M | Performing general administrative and technical order system activities | - |

NOTE: Columns may not add to 100 percent due to rounding

in a backshop. There were no first-enlistment personnel in the Training Cluster, the Supervisor Cluster, the Quality Assurance Inspector Job, or the Safety Inspector Job. This is not surprising, since personnel at the higher skill levels traditionally perform these jobs.

Table 30 displays commonly performed tasks for active duty first-enlistment personnel. The majority of tasks displayed involve performing operational checks of components, and inspecting, removing and installing components.

## Training Emphasis (TE) and Task Difficulty (TD) Data

TE and TD data are secondary factors that can help technical school personnel decide which entry-level training tasks to emphasize. These ratings, based on the judgments of senior career ladder NCOs at operational units, provide training personnel with a rank ordering of those tasks considered important for first-enlistment airman training (TE), and a measure of the difficulty of those tasks (TD). When combined with data on the percentages of first-enlistment personnel performing tasks, comparisons can be made to determine if training adjustments are necessary. For example, tasks receiving high ratings on both task factors (TE and TD), accompanied by moderate to high percentages performing, may warrant resident training. Those tasks receiving high task factor ratings, but low percentages performing may be more appropriately planned for OJT programs within the career ladder. Low task factor ratings may highlight tasks best omitted from training for first-enlistment personnel. This decision must be weighed against percentages of personnel performing the tasks, command concerns, and criticality of the tasks.

Table 31 lists the tasks having the highest TE ratings, as well as the percentages of first-job, first-enlistment, and TD ratings for each task. The majority of high TE tasks are performed by high percentages of both groups. Most tasks involve performing operational checks on various equipment pieces.

Table 32 lists the tasks having the highest TD rating, with the percentages of first-job, first-enlistment, 3-, 5-, and 7-skill level personnel performing, and TE ratings included for each task. The majority of tasks with high difficulty involve isolating malfunctions. Most of the tasks with high difficulty were performed fairly evenly across all levels, with a slight increase as members move up through the skill levels. Various lists of tasks, accompanied by TD ratings, are contained in the Training Extract package and should be reviewed in detail by technical school personnel. For a more detailed explanation of TD and TE ratings, see the Task Factor Administration in the **SURVEY METHODOLOGY** section of this report.

TABLE 30

MOST COMMONLY PERFORMED TASKS
FOR ACTIVE DUTY FIRST-ENLISTMENT 2A6X6 PERSONNEL

| TASKS | | PERCENT MEMBERS PERFORMING (N=362) |
|---|---|---|
| A17 | Crimp splices or terminals to wires | 92 |
| A4 | Assemble or disassemble connector plugs | 86 |
| K193 | Perform operational checks of exterior lighting | 79 |
| A26 | Inspect wire bundles or harnesses | 78 |
| A11 | Clean connector plugs | 76 |
| K194 | Perform operational checks of interior lighting | 76 |
| B59 | Remove or install AC power components | 72 |
| B54 | Perform operational checks of AC power systems | 72 |
| B56 | Perform operational checks of DC power systems | 70 |
| K195 | Remove or install exterior lighting components | 70 |
| K196 | Remove or install interior lighting components | 70 |
| K189 | Isolate exterior lighting malfunctions | 70 |
| R362 | Perform operational checks of air-conditioning systems | 69 |
| A24 | Inspect electrical bonds or grounds | 69 |
| A32 | Perform time compliance technical orders (TCTOs) modifications | 69 |
| D96 | Perform operational checks of anti-skid systems | 69 |
| B61 | Remove or install DC power components | 69 |
| R366 | Remove or install air-conditioning system components | 67 |
| B49 | Isolate AC power malfunctions | 67 |
| J178 | Perform operational checks of fire and overheat warning systems | 67 |
| K190 | Isolate interior lighting malfunctions | 67 |
| D102 | Remove or install anti-skid components | 66 |
| K187 | Inspect exterior lighting components | 65 |
| B51 | Isolate DC power malfunctions | 65 |
| R359 | Perform leakage checks of air-conditioning systems | 64 |
| K183 | Assemble or disassemble exterior lighting assemblies | 64 |
| K188 | Inspect interior lighting components | 64 |
| B43 | Inspect AC power components | 64 |
| P316 | Perform operational checks of bleed air systems | 63 |
| D84 | Inspect anti-skid components | 63 |
| P323 | Remove or install bleed air system components | 62 |
| B45 | Inspect DC power components | 62 |
| D90 | Isolate anti-skid malfunctions | 62 |
| R352 | Inspect air-conditioning systems | 61 |
| R355 | Isolate air-conditioning system malfunctions | 61 |
| P312 | Perform leakage checks of bleed air systems | 61 |
| B58 | Perform operational checks of external power systems | 61 |
| P297 | Inspect bleed air systems | 60 |
| O279 | Perform operational checks of cabin or cargo pressurization systems | 60 |

* Average Number of Tasks Performed - 120

TABLE 31

TECHNICAL TASKS RATED HIGHEST IN TRAINING EMPHASIS (TE)
BY AFSC 2A6X6 PERSONNEL

| TASKS | | PERCENT MEMBERS PERFORMING | | | |
|---|---|---|---|---|---|
| | | TNG EMP* | 1ST JOB | 1ST ENL | TASK DIFF** |
| A17 | Crimp spices or terminals to wires | 7.69 | 89 | 92 | 2.55 |
| B49 | Isolate AC power malfunctions | 7.13 | 59 | 67 | 7.37 |
| R355 | Isolate air-conditioning system malfunctions | 7.11 | 54 | 31 | 6.88 |
| B54 | Perform operational checks of AC power systems | 7.00 | 67 | 72 | 4.75 |
| O279 | Perform operational checks of cabin or cargo pressurization systems | 7.00 | 57 | 60 | 6.08 |
| D93 | Isolate landing gear control or warning malfunctions | 6.91 | 45 | 54 | 7.25 |
| J177 | Isolate fire and overheat detection circuit malfunctions | 6.91 | 50 | 57 | 6.32 |
| A26 | Inspect wire bundles or harnesses | 6.87 | 77 | 78 | 3.66 |
| B51 | Isolate DC power malfunctions | 6.87 | 58 | 65 | 6.71 |
| D96 | Perform operational checks of anti-skid systems | 6.84 | 65 | 69 | 5.31 |
| B56 | Perform operational checks of DC power systems | 6.78 | 64 | 70 | 4.55 |
| P304 | Isolate bleed air system malfunctions | 6.76 | 53 | 59 | 6.20 |
| B53 | Isolate external power system malfunctions | 6.67 | 46 | 56 | 6.49 |
| J178 | Perform operational checks of fire and overheat warning systems | 6.62 | 60 | 67 | 3.89 |
| R362 | Perform operational checks of air-conditioning systems | 6.62 | 65 | 69 | 4.92 |
| A4 | Assemble or disassemble connector plugs | 6.62 | 83 | 86 | 4.11 |
| P316 | Perform operational checks of bleed air systems | 6.60 | 60 | 63 | 4.93 |
| B58 | Perform operational checks of external power systems | 6.58 | 56 | 61 | 4.29 |

* Mean TE Rating is 2.65, and Standard Deviation is 1.66 (High TE = 4.31)
** Average TD Rating is 5.00

TABLE 32

TASKS RATED HIGHEST IN TASK DIFFICULTY (TD) BY AFSC 2A6X6 PERSONNEL

| TASKS | | TASK DIFF* | PERCENT MEMBERS PERFORMING 1ST JOB | 1ST ENL | 2A636 | 2A656 | 2A676 | TNG EMP* |
|---|---|---|---|---|---|---|---|---|
| G143 | Isolate flight control asymmetry system malfunctions | 7.87 | 10 | 13 | 14 | 24 | 24 | 3.24 |
| B49 | Isolate AC power malfunctions | 7.37 | 59 | 67 | 67 | 70 | 70 | 7.13 |
| B52 | Isolate emergency power malfunctions, other than batteries | 7.27 | 30 | 41 | 42 | 52 | 52 | 6.18 |
| D93 | Isolate landing gear control or warning malfunctions | 7.25 | 45 | 54 | 54 | 61 | 61 | 6.91 |
| G142 | Isolate flap or slat control and warning malfunctions | 7.22 | 19 | 25 | 23 | 35 | 35 | 4.04 |
| D92 | Isolate kneeling system malfunctions | 7.19 | 3 | 5 | 5 | 9 | 9 | 1.82 |
| U499 | Draft budget requirements | 7.12 | 0 | 1 | 1 | 1 | 1 | .58 |
| G145 | Isolate spoiler control malfunctions | 7.01 | 7 | 10 | 10 | 18 | 18 | 3.04 |
| C74 | Isolate propeller control circuit malfunctions | 6.97 | 2 | 7 | 8 | 10 | 10 | 1.64 |
| E117 | Isolate cargo ramp malfunctions | 6.95 | 14 | 17 | 16 | 24 | 24 | 2.96 |
| T437 | Perform ground engine runs | 6.94 | 18 | 20 | 20 | 22 | 22 | 1.29 |
| A33 | Remove or install components on circuit boards | 6.92 | 20 | 20 | 21 | 16 | 16 | 1.84 |
| A27 | Isolate test equipment malfunctions | 6.89 | 16 | 21 | 21 | 21 | 21 | 3.04 |
| R355 | Isolate air-conditioning system malfunctions | 6.88 | 54 | 61 | 62 | 65 | 65 | 7.11 |
| B50 | Isolate battery charger system malfunctions | 6.86 | 33 | 41 | 41 | 51 | 51 | 5.91 |
| U534 | Plan deployments of equipment or personnel | 6.82 | 0 | 0 | 0 | 4 | 4 | 1.18 |
| D94 | Isolate nose-wheel or nose-gear steering malfunctions | 6.81 | 28 | 32 | 31 | 38 | 38 | 5.29 |
| U500 | Draft inputs for status of resources, training, and supplies (SORTS) program | 6.76 | 0 | 0 | 0 | 3 | 3 | .89 |
| V564 | Develop training programs, plans, or procedures | 6.72 | 0 | 1 | 1 | 11 | 11 | 1.04 |
| B51 | Isolate DC power malfunctions | 6.71 | 58 | 65 | 65 | 68 | 68 | 6.87 |

* Average TD Rating is 5.00

** Mean TE Rating is 2.65, and Standard Deviation is 1.66 (High TE = 4.31)

Specialty Training Standard (STS)

A comprehensive review of the STS was made by comparing survey data to STS elements. SMEs matched JI tasks to appropriate STS sections and subsections. A complete computer listing displaying the percent members performing tasks, TE and TD ratings for each task, along with the STS matching, has been forwarded to the school for further review of training documents.

Typically, tasks which have sufficiently high TE and TD ratings, and are performed by at least 20 percent of personnel in appropriate experience or skill-level groups (such as first-enlistment or 1-48 months TAFMS, and 5- and 7-skill level groups), should be considered for inclusion in the STS. Likewise, tasks with less than 20 percent performing in all of these groups should be considered for deletion from the STS. Twenty-eight line items from the STS were not supported by 20 percent of personnel. Examples of these items are in Table 33, along with the accompanying JI task and survey data. Bench checking and inspecting various components were areas not performed by 20 percent of personnel. Training personnel and SMEs should review these areas to determine if inclusion in future revisions to the STS is warranted.

Tasks not matched to any element of the STS are listed at the end of the STS computer listing. These were reviewed to determine if there were any tasks concentrated around any particular functions or jobs. All of the tasks not matched were from the Performing General Aircraft and Cross Utilization Training Activities duty section. Examples of tasks not matched are in Table 34.

Examples of technical tasks performed by at least 20 percent of STS target group respondents, but which are not referenced to any STS element, are displayed in Table 34. Training personnel and SMEs should review these and other unreferenced tasks to determine STS inclusion.

## JOB SATISFACTION ANALYSIS

An examination of the job satisfaction indicators of various groups can give career ladder managers a better understanding of some of the factors which may affect the job performance of airmen in the career ladder. Questions covering job interest, perceived utilization of talents and training, sense of accomplishment from work, and reenlistment intentions were included in the survey booklet to provide indications of job satisfaction

The Aircraft Electrical and Environmental Systems survey booklet included questions covering job interest, perceived utilization of talents and training, sense of accomplishment from work, and reenlistment intentions. The responses of the current survey sample were then analyzed by making the following comparisons: (1) among TAFMS groups of the Aircraft Electrical and Environmental Systems career ladder and a comparative sample of personnel from other Mission Equipment Management career ladders surveyed in 1996; (2) between current and

TABLE 33

EXAMPLES OF STS ITEMS NOT SUPPORTED BY OSR DATA
(PERCENT MEMBERS PERFORMING)

| STS REFERENCE/TASKS | 3-LVL PROF CODE | TNG EMP | PERCENT MEMBERS PERFORMING 1ST ENL (N=362) | 5-LVL (N=578) | 7-LVL (N=242) | TSK DIF |
|---|---|---|---|---|---|---|
| *1a Communication Security (COMSEC)* | - | | | | | |
| U504 Establish communications security (COMSEC) subaccounts | | .69 | 0 | 0 | 0 | 6.52 |
| W588 Initiate classified reports, messages, or documents | | .49 | 1 | 1 | 1 | 6.00 |
| *22h* | - | | | | | |
| D83 Bench check nose-wheel or nose-gear steering components | | 2.13 | 9 | 8 | 5 | 5.37 |
| *25h. Bench check components* | - | | | | | |
| M204 Bench check aircraft fire extinguishing system components | | 1.84 | 5 | 8 | 4 | 5.21 |
| M205 Bench check aircraft fire suppression system components | | 1.69 | 4 | 7 | 3 | 5.39 |
| M206 Calibrate aircraft fire suppression systems | | 1.04 | 4 | 6 | 3 | 6.05 |
| *28h Bench check components* | - | | | | | |
| E107 Bench check cargo door control components | | 1.31 | 2 | 3 | 2 | 5.17 |
| E108 Bench check cargo hoist or winch components | | .87 | 2 | 3 | 2 | 4.98 |
| *30b(1) Jet engine* | | | | | | |
| S390 Isolate IBIS circuit component malfunctions | - | .84 | 1 | 2 | 1 | 6.24 |
| *31h Bench check components* | - | | | | | |
| L197 Bench check anti-ice or deice electrical control and warning components | | 1.98 | 7 | 8 | 4 | 4.77 |
| *33b Bsubsystem fundamentals* | | | | | | |
| P290 Bench check bleed air system components | | 1.87 | 5 | 6 | 4 | 5.41 |
| P289 Bench check ATMs or control devices | | .96 | 2 | 1 | 1 | 5.87 |

TD MEAN = 5.00; SD = 1.00
TE MEAN = 2.65; SD = 1.66

TABLE 34

TECHNICAL TASKS PERFORMED BY 20 PERCENT OR MORE
GROUP MEMBERS BUT NOT REFERENCED BY STS

| TASKS | | TNG EMP | PERCENT MEMBERS PERFORMING 1ST JOB | 1ST ENL | 2A636 (N=341) | 2A656 (N=578) | 2A676 (N=242) | TSK DIF |
|---|---|---|---|---|---|---|---|---|
| T466 | Static ground aircraft | 4.07 | 24 | 34 | 34 | 49 | 26 | 1.58 |
| T439 | Perform pre-use inspections of aircraft support equipment, such as hydraulic servicing carts or maintenance stands | 4.02 | 14 | 18 | 19 | 35 | 21 | 4.04 |
| T452 | Remove or install aircraft safety pins or locks | 3.82 | 34 | 42 | 41 | 49 | 25 | 3.22 |
| T472 | Walk wings or tails during aircraft towing operations | 3.47 | 51 | 56 | 55 | 62 | 39 | 1.54 |
| T427 | Inspect egress system safety pins | 3.31 | 12 | 16 | 16 | 19 | 9 | 3.61 |
| T448 | Remove or install aircraft doors or panels | 3.20 | 40 | 44 | 44 | 53 | 27 | 3.28 |
| T432 | Operate aircraft brakes during towing operations | 3.16 | 26 | 35 | 36 | 48 | 24 | 2.80 |
| T450 | Remove or install aircraft landing gear components | 2.91 | 21 | 30 | 31 | 42 | 19 | 5.39 |
| T429 | Launch or recover aircraft | 2.87 | 40 | 45 | 45 | 52 | 27 | 4.01 |
| T428 | Jack or level aircraft | 2.64 | 36 | 43 | 43 | 54 | 27 | 4.82 |
| T441 | Position or remove aircraft chocks | 2.64 | 49 | 53 | 53 | 59 | 27 | 1.71 |
| T430 | Marshall aircraft | 2.56 | 23 | 29 | 28 | 36 | 24 | 3.51 |
| T462 | Service engine constant speed drives (CSDs) | 2.53 | 12 | 17 | 18 | 28 | 15 | 3.84 |
| T425 | Inspect aircraft pneumatic systems | 2.40 | 11 | 12 | 14 | 24 | 13 | 4.52 |
| T473 | Wash aircraft | 2.27 | 38 | 42 | 42 | 30 | 13 | 1.96 |
| T440 | Perform supplemental inspections, such as acceptance, calendar, or time replacement item | 2.24 | 10 | 15 | 14 | 28 | 19 | 4.42 |
| T422 | Connect or disconnect portable hydraulic test stands to or from aircraft | 2.13 | 12 | 16 | 17 | 20 | 11 | 4.09 |
| T468 | Tow aircraft | 2.07 | 16 | 20 | 22 | 30 | 22 | 4.38 |
| T469 | Tow nonpowered Aerospace Ground Equipment (AGE) | 2.07 | 20 | 24 | 24 | 40 | 26 | 2.47 |
| T471 | Transport test equipment or units to or from flightline | 1.96 | 13 | 17 | 17 | 28 | 17 | 1.85 |

TD MEAN = 5.00; SD = 1.00

previous survey experience groups; and (3) across specialty groups identified in the **SPECIALTY JOBS** section of the report. In addition, the current study also lists job satisfaction across jobs by both ANG and AFRES.

Table 35 compares first-enlistment (1-48 months TAFMS), second-enlistment (49-96 months TAFMS), and career (97+ months TAFMS) group data to corresponding enlistment groups from other Mission Equipment Management AFSCs surveyed during the previous calendar year. These data give a relative measure of how the job satisfaction of AFSC 2A6X6 personnel compares with similar Air Force specialties. All three groups report comparable job satisfaction for all indicators except reenlistment intentions. The "NO OR PROBABLY NO" reenlistment intention indicators for all three groups were somewhat higher than other Mission Equipment Management AFSCs.

Table 36 compares job satisfaction indicator responses of the TAFMS groups in the current survey to TAFMS groups for the previous survey. Generally, the 1997 responses are very similar when compared to the 1993 responses.

An examination of job satisfaction data can also reveal the influences performing certain jobs may have on overall job satisfaction. Table 37 presents job satisfaction data for the jobs identified in the career ladder structure for AFSC 2A6X6. Overall, job satisfaction was very high across specialty jobs, with a slight decrease in job satisfaction for the Safety Inspection Job. Job satisfaction was highest for the Quality Assurance Inspector Job.

When there are issues in an occupation that are not directly addressed in the JI, survey respondents frequently provide write-in comments. The majority of write-in comments dealt with explaining the type of job held, base to which assigned (particularly ANG bases), or expanded upon the specific type of equipment used. Very few comments addressed anything other than the above mentioned topics.

## IMPLICATIONS

As explained in the **INTRODUCTION**, this survey was conducted as part of a 5-year cycle and to provide training personnel with current information on the Aircraft Electrical and Environmental Systems career ladder for use in reviewing current training programs and training documents. Overall job progression is normal and shows a distinct pattern as one moves from the 3- to the 7-skill level. The AFMAN 36-2108 *Specialty Description* broadly describes jobs and tasks being performed. Job satisfaction is high and there were not any serious problem areas noted. Analysis of career ladder documents indicate the STS contains a number of unsupported line items and learning objectives, and excludes an entire duty section. The unsupported items should be reviewed to determine if their inclusion in future revisions of the STS is warranted.

TABLE 35

## JOB SATISFACTION INDICATORS FOR ACTIVE DUTY AFSC 2A6X6 TAFMS GROUPS (PERCENT MEMBERS RESPONDING)

| | 1-48 MONTHS TAFMS | | 49-96 MONTHS TAFMS | | 97+ MONTHS TAFMS | |
|---|---|---|---|---|---|---|
| | AFSC 2A6X6 (N=362) | COMP SAMPLE (N=4,506) | AFSC 2A6X6 (N=250) | COMP SAMPLE (N=3,339) | AFSC 2A6X6 (N=549) | COMP SAMPLE (N=9,548) |
| EXPRESSED JOB INTEREST: | | | | | | |
| INTERESTING | 74 | 75 | 75 | 73 | 81 | 78 |
| SO-SO | 15 | 16 | 14 | 16 | 12 | 14 |
| DULL | 11 | 9 | 11 | 11 | 7 | 8 |
| PERCEIVED UTILIZATION OF TALENTS: | | | | | | |
| FAIRLY WELL TO PERFECTLY | 83 | 83 | 86 | 84 | 87 | 85 |
| LITTLE OR NOT AT ALL | 17 | 17 | 14 | 16 | 13 | 15 |
| PERCEIVED UTILIZATION OF TRAINING: | | | | | | |
| FAIRLY WELL TO PERFECTLY | 89 | 89 | 89 | 84 | 85 | 82 |
| LITTLE OR NOT AT ALL | 11 | 11 | 11 | 16 | 15 | 18 |
| SENSE OF ACCOMPLISHMENT GAINED FROM WORK: | | | | | | |
| SATISFIED | 71 | 73 | 70 | 72 | 77 | 75 |
| NEUTRAL | 14 | 14 | 15 | 13 | 9 | 11 |
| DISSATISFIED | 15 | 13 | 16 | 15 | 14 | 14 |
| REENLISTMENT INTENTIONS: | | | | | | |
| YES, OR PROBABLY YES | 54 | 63 | 68 | 73 | 73 | 78 |
| NO, OR PROBABLY NO | 46 | 36 | 32 | 26 | 7 | 7 |
| PLAN TO RETIRE | 0 | 1 | 0 | 1 | 19 | 15 |

TABLE 36

COMPARISON OF JOB SATISFACTION INDICATORS FOR AFSC 2A6X6
TAFMS GROUPS IN CURRENT STUDY TO PREVIOUS STUDY
(PERCENT MEMBERS RESPONDING)

| | 1-48 MONTHS TAFMS | | 49-96 MONTHS TAFMS | | 97+ MONTHS TAFMS | |
|---|---|---|---|---|---|---|
| | 1997 2A6X6 (N=362) | 1993 2A6X6 (N=897) | 1997 2A6X6 (N=250) | 1993 2A6X6 (N=575) | 1997 2A6X6 (N=549) | 1993 2A6X6 (N=1,456) |
| EXPRESSED JOB INTEREST: | | | | | | |
| INTERESTING | 74 | 77 | 75 | 75 | 81 | 76 |
| SO-SO | 15 | 14 | 14 | 16 | 12 | 16 |
| DULL | 11 | 8 | 11 | 9 | 7 | 8 |
| PERCEIVED UTILIZATION OF TALENTS: | | | | | | |
| FAIRLY WELL TO PERFECTLY | 83 | 83 | 86 | 84 | 87 | 84 |
| LITTLE OR NOT AT ALL | 17 | 17 | 14 | 16 | 13 | 16 |
| PERCEIVED UTILIZATION OF TRAINING: | | | | | | |
| FAIRLY WELL TO PERFECTLY | 89 | 88 | 89 | 86 | 85 | 81 |
| LITTLE OR NOT AT ALL | 11 | 12 | 11 | 14 | 15 | 18 |
| SENSE OF ACCOMPLISHMENT GAINED FROM WORK: | | | | | | |
| SATISFIED | 71 | 78 | 70 | 75 | 77 | 75 |
| NEUTRAL | 14 | 10 | 15 | 15 | 9 | 9 |
| DISSATISFIED | 15 | 11 | 16 | 15 | 14 | 16 |
| REENLISTMENT INTENTIONS: | | | | | | |
| YES, OR PROBABLY YES | 54 | 57 | 68 | 70 | 73 | 78 |
| NO, OR PROBABLY NO | 46 | 43 | 32 | 30 | 7 | 8 |
| PLAN TO RETIRE | 0 | 0 | 0 | 0 | 19 | 14 |

TABLE 37

COMPARISONS OF JOB SATISFACTION INDICATORS FOR MEMBERS OF SPECIALTY JOBS
(PERCENT MEMBERS RESPONDING)

| | POWER (STG134) (N=18) | FLIGHTLINE (STG083) (N=1,274) | BACKSHOP (STG107) (N=172) | OXYGEN (STG125) (N=12) |
|---|---|---|---|---|
| EXPRESSED JOB INTEREST: | | | | |
| INTERESTING | 83 | 84 | 67 | 67 |
| SO-SO | 0 | 11 | 19 | 17 |
| DULL | 17 | 5 | 15 | 17 |
| PERCEIVED UTILIZATION OF TALENTS: | | | | |
| FAIRLY WELL TO PERFECTLY | 83 | 89 | 81 | 75 |
| LITTLE OR NOT AT ALL | 17 | 11 | 19 | 25 |
| PERCEIVED UTILIZATION OF TRAINING: | | | | |
| FAIRLY WELL TO PERFECTLY | 89 | 93 | 82 | 83 |
| LITTLE OR NOT AT ALL | 11 | 7 | 18 | 17 |
| SENSE OF ACCOMPLISHMENT GAINED FROM WORK: | | | | |
| SATISFIED | 72 | 78 | 63 | 75 |
| NEUTRAL | 0 | 11 | 21 | 8 |
| DISSATISFIED | 28 | 12 | 16 | 17 |
| REENLISTMENT INTENTIONS: | | | | |
| YES, OR PROBABLY YES | 67 | 75 | 65 | 92 |
| NO, OR PROBABLY NO | 22 | 18 | 28 | 0 |
| PLAN TO RETIRE | 6 | 6 | 6 | 8 |

TABLE 37 (CONTINUED)

COMPARISONS OF JOB SATISFACTION INDICATORS BY SPECIALTY JOBS
(PERCENT MEMBERS RESPONDING)

| | TRAINING (STG084) (N=30) | QA INSPECTOR (STG127) (N=11) | SUPERVISOR (STG099) (N=86) | SAFETY INSPECTOR (STG122) (N=12) |
|---|---|---|---|---|
| EXPRESSED JOB INTEREST: | | | | |
| INTERESTING | 93 | 91 | 88 | 83 |
| SO-SO | 3 | 9 | 7 | 13 |
| DULL | 3 | 0 | 5 | 3 |
| PERCEIVED UTILIZATION OF TALENTS: | | | | |
| FAIRLY WELL TO PERFECTLY | 93 | 100 | 93 | 83 |
| LITTLE OR NOT AT ALL | 7 | 0 | 7 | 17 |
| PERCEIVED UTILIZATION OF TRAINING: | | | | |
| FAIRLY WELL TO PERFECTLY | 97 | 100 | 78 | 58 |
| LITTLE OR NOT AT ALL | 3 | 0 | 22 | 42 |
| SENSE OF ACCOMPLISHMENT GAINED FROM WORK: | | | | |
| SATISFIED | 97 | 100 | 84 | 67 |
| NEUTRAL | 0 | 0 | 2 | 25 |
| DISSATISFIED | 3 | 0 | 14 | 8 |
| REENLISTMENT INTENTIONS: | | | | |
| YES, OR PROBABLY YES | 90 | 91 | 72 | 58 |
| NO, OR PROBABLY NO | 3 | 0 | 3 | 8 |
| PLAN TO RETIRE | 7 | 9 | 24 | 33 |

From the standpoint of data gathered during this OSR, the AFSC 2A6X6 career ladder structure reflects a wide diversity and variety of jobs performed by career ladder members. Almost three-quarters of career ladder members spend their time on the flightline. The Backshop Cluster is the place most of the remaining personnel are located. Despite the diversity of work found in the career ladder, job progression shows a distinct pattern as one moves from the 3- to 7-skill levels. The AFMAN 36-2108 *Specialty Description* broadly describes the jobs performed.

THIS PAGE INTENTIONALLY LEFT BLANK

# APPENDIX A

## REPRESENTATIVE TASKS PERFORMED BY MEMBERS OF CAREER LADDER JOBS

THIS PAGE INTENTIONALLY LEFT BLANK

TABLE A1

REPRESENTATIVE TASKS PERFORMED
POWER
(N=18)

| TASKS | | PERCENT MEMBERS PERFORMING |
|---|---|---|
| A17 | CRIMP SPLICES OR TERMINALS TO WIRES | 100 |
| B54 | PERFORM OPERATIONAL CHECKS OF AC POWER SYSTEMS | 100 |
| B59 | REMOVE OR INSTALL AC POWER COMPONENTS | 100 |
| B56 | PERFORM OPERATIONAL CHECKS OF DC POWER SYSTEMS | 94 |
| A4 | ASSEMBLE OR DISASSEMBLE CONNECTOR PLUGS | 94 |
| B61 | REMOVE OR INSTALL DC POWER COMPONENTS | 94 |
| A11 | CLEAN CONNECTOR PLUGS | 89 |
| B49 | ISOLATE AC POWER MALFUNCTIONS | 83 |
| B58 | PERFORM OPERATIONAL CHECKS OF EXTERNAL POWER SYSTEMS | 83 |
| A24 | INSPECT ELECTRICAL BONDS OR GROUNDS | 78 |
| B51 | ISOLATE DC POWER MALFUNCTIONS | 78 |
| A26 | INSPECT WIRE BUNDLES OR HARNESSES | 72 |
| A29 | PERFORM CORROSION CONTROL | 72 |
| B45 | INSPECT DC POWER COMPONENTS | 72 |
| B55 | PERFORM OPERATIONAL CHECKS OF BATTERY CHARGER SYSTEMS | 72 |
| A32 | PERFORM TIME COMPLIANCE TECHNICAL ORDERS (TCTOs) MODIFICATIONS | 67 |
| B60 | REMOVE OR INSTALL BATTERY CHARGER SYSTEMS | 67 |
| A3 | APPLY SEALANT TO CONNECTORS OR RELAYS | 67 |
| B43 | INSPECT AC POWER COMPONENTS | 61 |
| B57 | PERFORM OPERATIONAL CHECKS OF EMERGENCY POWER SYSTEMS | 61 |
| B53 | ISOLATE EXTERNAL POWER SYSTEM MALFUNCTIONS | 61 |
| B44 | INSPECT BATTERY CHARGER SYSTEMS | 61 |
| B63 | REMOVE OR INSTALL EXTERNAL POWER COMPONENTS | 61 |
| A22 | FABRICATE WIRE BUNDLES OR HARNESSES | 56 |
| A20 | FABRICATE ELECTRICAL LEADS | 56 |
| B52 | ISOLATE EMERGENCY POWER MALFUNCTIONS, OTHER THAN BATTERIES | 50 |
| B47 | INSPECT EXTERNAL POWER COMPONENTS | 50 |
| A25 | INSPECT TEST EQUIPMENT | 50 |

Average number of tasks performed = 64

TABLE A2

REPRESENTATIVE TASKS PERFORMED
FLIGHTLINE
(N=1,274)

| TASKS | | PERCENT MEMBERS PERFORMING |
|---|---|---|
| K193 | PERFORM OPERATIONAL CHECKS OF EXTERIOR LIGHTING | 97 |
| K194 | PERFORM OPERATIONAL CHECKS OF INTERIOR LIGHTING | 96 |
| A17 | CRIMP SPLICES OR TERMINALS TO WIRES | 95 |
| B54 | PERFORM OPERATIONAL CHECKS OF AC POWER SYSTEMS | 95 |
| B59 | REMOVE OR INSTALL AC POWER COMPONENTS | 95 |
| K195 | REMOVE OR INSTALL EXTERIOR LIGHTING COMPONENTS | 94 |
| K196 | REMOVE OR INSTALL INTERIOR LIGHTING COMPONENTS | 94 |
| B56 | PERFORM OPERATIONAL CHECKS OF DC POWER SYSTEMS | 94 |
| K189 | ISOLATE EXTERIOR LIGHTING MALFUNCTIONS | 94 |
| J178 | PERFORM OPERATIONAL CHECKS OF FIRE AND OVERHEAT WARNING SYSTEMS | 93 |
| B61 | REMOVE OR INSTALL DC POWER COMPONENTS | 93 |
| R362 | PERFORM OPERATIONAL CHECKS OF AIR-CONDITIONING SYSTEMS | 92 |
| K190 | ISOLATE INTERIOR LIGHTING MALFUNCTIONS | 92 |
| D96 | PERFORM OPERATIONAL CHECKS OF ANTI-SKID SYSTEMS | 92 |
| A4 | ASSEMBLE OR DISASSEMBLE CONNECTOR PLUGS | 91 |
| R366 | REMOVE OR INSTALL AIR-CONDITIONING SYSTEM COMPONENTS | 91 |
| A11 | CLEAN CONNECTOR PLUGS | 90 |
| B49 | ISOLATE AC POWER MALFUNCTIONS | 90 |
| D102 | REMOVE OR INSTALL ANTI-SKID COMPONENTS | 90 |
| D84 | INSPECT ANTI-SKID COMPONENTS | 89 |
| R355 | ISOLATE AIR-CONDITIONING SYSTEM MALFUNCTIONS | 89 |
| A26 | INSPECT WIRE BUNDLES OR HARNESSES | 89 |
| R359 | PERFORM LEAKAGE CHECKS OF AIR-CONDITIONING SYSTEMS | 89 |
| D90 | ISOLATE ANTI-SKID MALFUNCTIONS | 89 |
| R352 | INSPECT AIR-CONDITIONING SYSTEMS | 88 |
| B51 | ISOLATE DC POWER MALFUNCTIONS | 88 |
| J177 | ISOLATE FIRE AND OVERHEAT DETECTION CIRCUIT MALFUNCTIONS | 88 |
| I171 | REMOVE OR INSTALL FIRE OR OVERHEAT SYSTEM COMPONENTS | 87 |

Average number of tasks performed = 193

TABLE A3

REPRESENTATIVE TASKS PERFORMED
BACKSHOP
(N=172)

| TASKS | | PERCENT MEMBERS PERFORMING |
|---|---|---|
| A17 | CRIMP SPLICES OR TERMINALS TO WIRES | 94 |
| H156 | CLEAN BATTERIES | 94 |
| N230 | INSPECT LOX SERVICING CARTS | 94 |
| N245 | PERFORM LEAKAGE CHECKS OF LOX SERVICING CARTS | 93 |
| H154 | ASSEMBLE OR DISASSEMBLE BATTERIES | 92 |
| A4 | ASSEMBLE OR DISASSEMBLE CONNECTOR PLUGS | 91 |
| H157 | INSPECT BATTERIES | 91 |
| N251 | PERFORM OPERATIONAL CHECKS OF LOX SERVICING CARTS | 89 |
| H163 | PERFORM CAPACITANCE TESTS AND SERVICE BATTERIES | 88 |
| N238 | ISOLATE LOX SERVICING CART MALFUNCTIONS | 87 |
| K185 | BENCH CHECK EXTERIOR LIGHTING COMPONENTS | 86 |
| N262 | REMOVE OR INSTALL LOX SERVICING CART COMPONENTS | 81 |
| N228 | INSPECT GOX SERVICING CARTS | 81 |
| A26 | INSPECT WIRE BUNDLES OR HARNESSES | 81 |
| A11 | CLEAN CONNECTOR PLUGS | 81 |
| N259 | PURGE LOX SERVICING CARTS | 80 |
| Y618 | ACCESS CORE AUTOMATED MAINTENANCE SYSTEM (CAMS) MENUS AND DATA SCREENS | 80 |
| K183 | ASSEMBLE OR DISASSEMBLE EXTERIOR LIGHTING ASSEMBLIES | 77 |
| N243 | PERFORM LEAKAGE CHECKS OF GOX SERVICING CARTS | 77 |
| S404 | PERFORM OPERATIONAL CHECKS OF LIN SERVICING CARTS | 76 |
| N249 | PERFORM OPERATIONAL CHECKS OF GOX SERVICING CARTS | 76 |
| S382 | INSPECT LIQUID NITROGEN SERVICING CARTS | 74 |
| S398 | PERFORM LEAKAGE CHECKS OF LIN SERVICING CARTS | 74 |
| K186 | BENCH CHECK INTERIOR LIGHTING COMPONENTS | 73 |
| H158 | INSPECT BATTERY CHARGER ANALYZER COMPONENTS | 73 |
| A10 | BENCH CHECK RELAYS | 73 |
| S407 | PURGE LIN SERVICING CARTS | 72 |
| N236 | ISOLATE GOX SERVICING CART MALFUNCTIONS | 70 |

Average number of tasks performed = 119

TABLE A4

REPRESENTATIVE TASKS PERFORMED
OXYGEN
(N=12)

| TASKS | | PERCENT MEMBERS PERFORMING |
|---|---|---|
| H163 | PERFORM CAPACITANCE TESTS AND SERVICE BATTERIES | 100 |
| N245 | PERFORM LEAKAGE CHECKS OF LOX SERVICING CARTS | 100 |
| H154 | ASSEMBLE OR DISASSEMBLE BATTERIES | 92 |
| H156 | CLEAN BATTERIES | 92 |
| H157 | INSPECT BATTERIES | 92 |
| N230 | INSPECT LOX SERVICING CARTS | 92 |
| N251 | PERFORM OPERATIONAL CHECKS OF LOX SERVICING CARTS | 92 |
| N249 | PERFORM OPERATIONAL CHECKS OF GOX SERVICING CARTS | 92 |
| Y618 | ACCESS CORE AUTOMATED MAINTENANCE SYSTEM (CAMS) MENUS AND DATA SCREENS | 92 |
| N259 | PURGE LOX SERVICING CARTS | 83 |
| N262 | REMOVE OR INSTALL LOX SERVICING CART COMPONENTS | 83 |
| N238 | ISOLATE LOX SERVICING CART MALFUNCTIONS | 83 |
| N243 | PERFORM LEAKAGE CHECKS OF GOX SERVICING CARTS | 83 |
| N260 | REMOVE OR INSTALL GOX SERVICING CART COMPONENTS | 75 |
| N236 | ISOLATE GOX SERVICING CART MALFUNCTIONS | 75 |
| N228 | INSPECT GOX SERVICING CARTS | 75 |
| H162 | ISOLATE BATTERY MALFUNCTIONS | 58 |
| X607 | EVALUATE SERVICEABILITY OF EQUIPMENT, TOOLS, PARTS, OR SUPPLIES | 58 |
| A29 | PERFORM CORROSION CONTROL | 58 |
| S413 | REMOVE OR INSTALL LIQUID NITROGEN SERVICING COMPONENTS | 50 |
| S404 | PERFORM OPERATIONAL CHECKS OF LIN SERVICING CARTS | 50 |
| W596 | MAINTAIN TECHNICAL ORDER LIBRARIES | 50 |
| S407 | PURGE LIN SERVICING CARTS | 50 |
| X610 | INVENTORY AND STORE EQUIPMENT, TOOLS, PARTS, OR SUPPLIES | 50 |
| X612 | MAINTAIN BENCHSTOCK PARTS OR EQUIPMENT LEVELS | 50 |
| S373 | FILL CARBON DIOXIDE (CO2) LIFERAFT CYLINDERS | 50 |
| X604 | COORDINATE SUPPLY-RELATED MATTERS WITH APPROPRIATE AGENCIES | 50 |
| S382 | INSPECT LIQUID NITROGEN SERVICING CARTS | 42 |

Average number of tasks performed = 49

TABLE A5

REPRESENTATIVE TASKS PERFORMED
TRAINING
(N=30)

| TASKS | | PERCENT MEMBERS PERFORMING |
|---|---|---|
| V554 | CONDUCT FORMAL COURSE CLASSROOM TRAINING | 100 |
| V563 | DEVELOP TRAINING MATERIALS OR AIDS | 100 |
| V574 | PERSONALIZE LESSON PLANS | 97 |
| V549 | ADMINISTER OR SCORE TESTS | 93 |
| V559 | DEMONSTRATE OPERATION OF EQUIPMENT | 93 |
| V568 | EVALUATE PROGRESS OF TRAINEES | 87 |
| V562 | DEVELOP PERFORMANCE TESTS | 87 |
| V558 | DEMONSTRATE HOW TO LOCATE TECHNICAL INFORMATION | 77 |
| V561 | DEVELOP FORMAL COURSE CURRICULA, PLANS OF INSTRUCTIONS, (POIs), OR SPECIALTY TRAINING STANDARDS (STSs) | 77 |
| U528 | INSPECT PERSONNEL FOR COMPLIANCE WITH MILITARY STANDARDS | 70 |
| V564 | DEVELOP TRAINING PROGRAMS, PLANS, OR PROCEDURES | 70 |
| V573 | MAINTAIN TRAINING RECORDS OR FILES | 70 |
| V566 | EVALUATE EFFECTIVENESS OF TRAINING PROGRAMS, PLANS, OR PROCEDURES | 67 |
| U532 | PARTICIPATE IN GENERAL MEETINGS, SUCH AS STAFF MEETINGS, BRIEFINGS, CONFERENCES, OR WORKSHOPS, OTHER THAN CONDUCTING | 67 |
| V556 | CONDUCT RESIDENT COURSE CLASSROOM TRAINING | 63 |
| V572 | INSPECT TRAINING MATERIALS OR AIDS FOR OPERATION OR SUITABILITY | 63 |
| U479 | CONDUCT SAFETY INSPECTIONS OF EQUIPMENT OR FACILITIES | 60 |
| V565 | ESTABLISH OR MAINTAIN STUDY REFERENCE FILES | 60 |
| V560 | DETERMINE TRAINING REQUIREMENTS | 60 |
| U485 | COUNSEL SUBORDINATES CONCERNING PERSONAL MATTERS | 60 |
| V553 | COMPLETE STUDENT ENTRY OR WITHDRAWAL FORMS | 53 |
| U480 | CONDUCT SELF-INSPECTIONS OR SELF-ASSESSMENTS | 53 |
| U478 | CONDUCT GENERAL MEETINGS, SUCH AS STAFF MEETINGS, BRIEFINGS, CONFERENCES, OR WORKSHOPS | 53 |
| W596 | MAINTAIN TECHNICAL ORDER LIBRARIES | 50 |
| V567 | EVALUATE PERSONNEL TO DETERMINE TRAINING NEEDS | 50 |
| V575 | PLAN OR SCHEDULE TRAINING | 50 |

Average number of tasks performed = 66

TABLE A6

REPRESENTATIVE TASKS PERFORMED
QUALITY ASSURANCE INSPECTOR
(N=11)

| TASKS | | PERCENT MEMBERS PERFORMING |
|---|---|---|
| Y618 | ACCESS CORE AUTOMATED MAINTENANCE SYSTEM (CAMS) MENUS AND DATA SCREENS | 100 |
| W583 | COMPLETE ACCIDENT OR INCIDENT REPORTS | 100 |
| Y620 | ANALYZE CAMS DATA | 100 |
| Y629 | EVALUATE MAINTENANCE PROCEDURES | 91 |
| Y645 | REVIEW AIRCRAFT FLIGHT OR MAINTENANCE RECORDS, SUCH AS AFTO FORMS 781 SERIES | 91 |
| U479 | CONDUCT SAFETY INSPECTIONS OF EQUIPMENT OR FACILITIES | 91 |
| Y638 | INITIATE TECHNICAL ORDER IMPROVEMENT REPORTS | 91 |
| Y637 | INITIATE OR ANNOTATE AIRCRAFT FLIGHT OR MAINTENANCE RECORDS, SUCH AS AFTO FORMS 781 SERIES | 91 |
| W600 | REVIEW PUBLISHING BULLETINS OR TECHNICAL ORDER CHANGES | 82 |
| U511 | EVALUATE JOB HAZARDS OR COMPLIANCE WITH AIR FORCE OCCUPATIONAL SAFETY AND HEALTH (AFOSH) PROGRAM | 82 |
| Y644 | RETRIEVE CAMS LISTINGS OR REPORTS | 82 |
| Y642 | PERFORM MAINTENANCE ACTIVITY INSPECTIONS OR SELF-INSPECTIONS | 82 |
| A26 | INSPECT WIRE BUNDLES OR HARNESSES | 82 |
| A25 | INSPECT TEST EQUIPMENT | 82 |
| T426 | INSPECT AIRFRAME OR AIRFRAME LINE REPLACEABLE UNITS (LRUs) | 82 |
| B43 | INSPECT AC POWER COMPONENTS | 82 |
| B45 | INSPECT DC POWER COMPONENTS | 82 |
| U539 | REVIEW DRAFTS OF REGULATIONS, MANUALS, OR OTHER DIRECTIVES | 82 |
| K188 | INSPECT INTERIOR LIGHTING COMPONENTS | 82 |
| J176 | INSPECT FIRE AND OVERHEAT DETECTION CIRCUIT COMPONENTS | 82 |
| P297 | INSPECT BLEED AIR SYSTEMS | 82 |
| B047 | INSPECT EXTERNAL POWER COMPONENTS | 82 |
| R352 | INSPECT AIR-CONDITIONING SYSTEMS | 82 |
| O270 | INSPECT CABIN OR CARGO PRESSURIZATION SYSTEMS | 82 |

Average number of tasks performed = 93

TABLE A7

REPRESENTATIVE TASKS PERFORMED
SUPERVISORS
(N=86)

| TASKS | | PERCENT MEMBERS PERFORMING |
|---|---|---|
| U543 | SUPERVISE MILITARY PERSONNEL | 94 |
| U488 | DETERMINE OR ESTABLISH WORK ASSIGNMENTS OR PRIORITIES | 88 |
| U483 | CONDUCT SUPERVISORY PERFORMANCE FEEDBACK SESSIONS | 88 |
| U518 | EVALUATE PERSONNEL FOR COMPLIANCE WITH PERFORMANCE STANDARDS | 86 |
| U492 | DEVELOP OR ESTABLISH WORK SCHEDULES | 85 |
| U546 | WRITE PERFORMANCE REPORTS OR SUPERVISORY APPRAISALS | 84 |
| U485 | COUNSEL SUBORDINATES CONCERNING PERSONAL MATTERS | 84 |
| U486 | DETERMINE OR ESTABLISH LOGISTICS REQUIREMENTS, SUCH AS PERSONNEL, EQUIPMENT, TOOLS, PARTS, SUPPLIES, OR WORKSPACE | 80 |
| U475 | ASSIGN PERSONNEL TO WORK AREAS OR DUTY POSITIONS | 79 |
| U480 | CONDUCT SELF-INSPECTIONS OR SELF-ASSESSMENTS | 79 |
| U532 | PARTICIPATE IN GENERAL MEETINGS, SUCH AS STAFF MEETINGS, BRIEFINGS, CONFERENCES, OR WORKSHOPS, OTHER THAN CONDUCTING | 78 |
| U522 | EVALUATE WORK SCHEDULES | 78 |
| U491 | DEVELOP OR ESTABLISH WORK METHODS OR PROCEDURES | 78 |
| U478 | CONDUCT GENERAL MEETINGS, SUCH AS STAFF MEETINGS, BRIEFINGS, CONFERENCES, OR WORKSHOPS | 77 |
| U519 | EVALUATE PERSONNEL FOR PROMOTION, DEMOTION, RECLASSIFICATION, OR SPECIAL AWARDS | 77 |
| U537 | PLAN OR SCHEDULE WORK ASSIGNMENT OR PRIORITIES | 76 |
| U506 | ESTABLISH PERFORMANCE STANDARDS FOR SUBORDINATES | 76 |
| U540 | SCHEDULE PERSONNEL FOR TEMPORARY DUTY (TDY) ASSIGNMENTS, LEAVES, OR PASSES | 74 |
| U528 | INSPECT PERSONNEL FOR COMPLIANCE WITH MILITARY STANDARDS | 74 |
| U482 | CONDUCT SUPERVISORY ORIENTATIONS FOR NEWLY ASSIGNED PERSONNEL | 74 |
| Y618 | ACCESS CORE AUTOMATED MAINTENANCE SYSTEM (CAMS) MENUS AND DATA SCREENS | 72 |

Average number of tasks performed = 74

TABLE A8

REPRESENTATIVE TASKS PERFORMED
SAFETY INSPECTORS
(N=12)

| TASKS | | PERCENT MEMBERS PERFORMING |
|---|---|---|
| U532 | PARTICIPATE IN GENERAL MEETINGS, SUCH AS STAFF MEETINGS, BRIEFINGS, CONFERENCES, OR WORKSHOPS, OTHER THAN CONDUCTING | 92 |
| U478 | CONDUCT GENERAL MEETINGS, SUCH AS STAFF MEETINGS, BRIEFINGS, CONFERENCES, OR WORKSHOPS | 92 |
| U480 | CONDUCT SELF-INSPECTIONS OR SELF-ASSESSMENTS | 83 |
| U481 | CONDUCT STAFF ASSISTANCE VISITS, INSPECTIONS, OR AUDITS | 83 |
| U479 | CONDUCT SAFETY INSPECTIONS OF EQUIPMENT OR FACILITIES | 75 |
| U508 | EVALUATE ACCIDENT OR INCIDENT REPORTS | 75 |
| U511 | EVALUATE JOB HAZARDS OR COMPLIANCE WITH AIR FORCE OCCUPATIONAL SAFETY AND HEALTH (AFOSH) PROGRAM | 75 |
| U521 | EVALUATE SAFETY OR SECURITY PROGRAMS | 75 |
| U544 | WRITE INSPECTION REPORTS | 75 |
| U538 | PLAN SAFETY OR SECURITY PROGRAMS | 75 |
| U538 | PLAN SAFETY OR SECURITY PROGRAMS | 67 |
| W583 | COMPLETE ACCIDENT OR INCIDENT REPORTS | 67 |
| U530 | WRITE REPLIES TO INSPECTIONS REPORTS | 67 |
| U495 | DEVELOP SELF-INSPECTION OR SELF-ASSESSMENT PROGRAM CHECKLISTS | 67 |
| W594 | MAINTAIN OR UPDATE STATUS INDICATORS, SUCH AS BOARDS, GRAPHS, OR CHARTS | 67 |
| W593 | MAINTAIN ADMINISTRATIVE FILES | 67 |
| U510 | EVALUATE INSPECTION REPORT FINDINGS OR INSPECTIONS PROCEDURES | 58 |
| U530 | INVESTIGATE ACCIDENTS OR INCIDENTS | 58 |
| U498 | DRAFT AGENDA FOR GENERAL MEETINGS, SUCH AS STAFF MEETINGS, BRIEFINGS, CONFERENCES, OR WORKSHOPS | 58 |
| U505 | ESTABLISH ORGANIZATIONAL POLICIES, SUCH AS OPERATING INSTRUCTIONS (OIs) OR STANDARD OPERATING PROCEDURES (SOPs) | 58 |
| Y633 | IMPLEMENT GROUND SAFETY PROGRAMS OR PROCEDURES | 50 |

Average number of tasks performed = 32